

Longfloor is a limestone based binder containing specially selected additives. When mixed with cement, sand and water it produces a free-flowing cementitious screed. It is suitable for all types of flooring applications.

## Longfloor Technical Data

- Longfloor CT-25/F4
- Compressive Strength @ 28 Days -  $\geq 25\text{N/mm}^2$
- Flexural Strength @ 28 Days -  $\geq 4\text{N/mm}^2$
- (Higher compressive strength grades available upon request) Fresh Wet Density – 2,100-2,200kgs/m<sup>3</sup>  
Dry Density – 1,950-2,050kgs/m<sup>3</sup>
- Appearance / Colour – Grey fluid screed mix
- Longfloor is the subject of UK Patent Application Number 1808868.2

## Specification

### (To BS EN 13813:2002)

- Flow Range – 260-280mm
- Maintenance of Flow - > 2 Hours (greater retention periods are available upon request)
- Fire Rating (B.S. 476 Part 4) – Non-combustible / A1 rating
- Drying Shrinkage -  $< 500\mu\text{m/m}$  pH -  $\geq 10$
- Thermal Conductivity – 1.7W/m.K

## Minimum Thickness

- Cover to underfloor heating pipes – 30mm
- Unbonded – 35mm
- Floating – 40mm
- Bonded – 25mm

(Note, these are minimum thicknesses, not nominal)

## Drying Times

Longfloor will be suitable to receive non-moisture sensitive floor finishes between 7-14 days. In ideal conditions (20°C and 65% relative humidity) the screed will have achieved 75% R/H (0.5% moisture) at 21 days. Underfloor heating systems can be turned on after 10 days and the system gradually brought up to operating temperature.

## Sanding

Longfloor requires no sanding prior to the application of floor finishes, however industry guidance suggests all screeds should be lightly abraded prior to the application of floor finishes. Longfloor is compatible with all types of primers, grouts and adhesives. Longfloor is not intended to be a wearing screed.

## Jointing

Bay Sizes - maximum bay size between 100-150m<sup>2</sup>. This is dependent on length to width ratio and shape of area to be poured. Please note that larger areas may require the use of an alternative curing agent. Please consult with the Longfloor technical department for advice as required. Consideration should always be made for the allowance of joints when the length to width aspect ratio exceeds 2:1, across doorway thresholds, where there are columns, pipes etc. projecting through the screed and where there is a change in the underfloor heating zone (if applicable).

## Floor Flatness

SR2 as described in BS8204

Longfloor is manufactured in a factory environment that complies with all aspects of ISO 9001.

## Placing and Curing

The building should be fully weather proof before pouring commences. Where applicable, especially on ground floors, there must be a damp-proof membrane below the screed or base. The screed should only be laid when the internal air temperature is between 5°C and 30°C. Longfloor should be used and installed in accordance with the recommendations given in the Code of Practice: BS 8204.

The freshly poured Longfloor screed is levelled using a dappling bar, ensuring two passes are undertaken 90 degrees to each other. The floor should not be subjected to severe draughts, direct sunlight or heating for the first 24-48 hours to prevent rapid drying during this important early stage. Longfloor is to be sprayed only with our approved “LongCure” water based polymer dispersion (please see separate “LongCure” datasheet for information on this material and application methodologies). After placing, the room in which the screed has been laid should be sealed therefore for a minimum of 24 hours, the room will be suitable for light foot traffic after this period and can be worked on after 72 hours.

## Drying

The ambient conditions must be suitable for the drying of the screed with low air humidity (preferably 60% RH or less) and good ventilation. Before floor finishes are laid, the moisture content of the screed should be ascertained to be at, or below the required level. Forced drying of Longfloor is possible if required: after seven days heaters and dehumidifiers may be used to improve drying conditions. Underfloor can be commissioned after 10-days and can also be used to speed up the drying time.

## Environmental

Longfloor binder contains 95% recycled content as verified under ISO 14021. Certificate available on request.