



**THERM**

# High Performance Concrete



## Product Description

Cemfloor HPC Therm is a specially formulated high performance concrete that can be used to create stronger and more durable floors with less shrinkage and increased bay sizes to minimise joints compared to those constructed with conventional concrete. Higher compressive and flexural strengths are achieved enabling a reduction in slab thickness providing an improved environmental profile. High quality finishes can be achieved without power floating. Cemfloor HPC Therm is compatible with underfloor heating systems.

## Benefits

- Fluid concrete ensures full compaction throughout the concrete
- High quality surface finish is achieved
- Full compaction with minimal air voids around UFH pipes.
- Reduced labour required for installation compared to traditional concrete
- No vibration or power floating required
- High Thermal Conductivity

## Characteristics

- High fluidity ensures excellent pumping characteristics
- Floor finish tolerance to BS 8204 - 1
- Maintenance of fluidity - Three hours
- Compressive strength at 28 days - Minimum 30N/mm<sup>2</sup>
- Improved Flexural Strength at 28 Days
- Minimum thickness - 65mm
- Drying Shrinkage - Less than 500 micron/metre
- Reduced Risk of Cracking
- Flow range - 650 - 750mm

## Application

To ensure a high quality finished product it is recommended that application is carried out by a specialist contractor who has been approved to place Cemfloor HPC Therm. The freshly poured concrete will need to be levelled using a dappling bar, ensuring to dapple the surface in two passes at 90°. After dappling the slab must be cured with a suitable high efficiency water based curing agent.

# Floor Coverings

Cemfloor HPC Therm is compatible with all floor coverings, and all cementitious adhesives including fast track systems. The slabs moisture content should be measured before placing floor coverings to ensure that it is adequately dried. It is recommended to abrade/sand the surface to clean and remove any building residue and curing agents; to ensure adequate adhesion of the flooring adhesive to the hardened concrete.

Compressive Strength	Minimum 30N/mm <sup>2</sup>
Surface Flatness	SR2
Minimum Thickness	Floating: Domestic: 65mm Commercial: 75mm
Shrinkage (28 Days)	<0.05%
Slump Flow	650 — 750mm
Fresh Density	2250 — 2350 kg/m <sup>3</sup>
Open to Light Foot Traffic	24-48 Hours
Maximum Bay Sizes	Heated Floors - 80m <sup>2</sup>

