

ECOLIT Lightweight concrete.
TECHNICAL DATA SHEET

ECOLIT Lightweight concrete, used for making any type of screeds and internal filling, is a unique lightweight cellular concrete construction material, which allows for practical construction implementation of the new system.

When ECOLIT Lightweight concrete is poured into the support structure made of cement boards, reinforced with light steel profiles, it fills the space homogeneously and at the end provides for equal dry density, strength and properties throughout; naturally integrating itself at the micro level with the panels material of same nature, resulting into a dead weight reduced, monolithic and uniform concrete construction.

ECOLIT Lightweight concrete DRY MIX is a unique powder to make lightweight cellular concrete in-situ. The mortar is made from a set of components on-site, which when mixed with water, becomes monolithic cellular concrete. It has a wide range of application: filling of apertures and overlapping in light-gauge steel structure erection floor screeds, flat roofing, road and pipe carpeting, thermal and sound insulation elements.

ECOLIT Lightweight DRY MIX is supplied in Fifty (50) kg bags should be mixed with potable water only in ECOLIT mixer unit.

ECOLIT Lightweight DRY MIX is three-component pre-mix:

- Ordinary Portland cement
- ECOLIT modified components
- ECOLIT FOAM Generator liquid (EFG)
- ECOLIT steel protection additive



The amount of water to be added is Twenty-Five to Twenty-Six (25-26) liters per Fifty (50) kg bag (i.e., approximately 50% by weight). Add ECOLIT Lightweight DRY MIX to water, turn the contents in Five (2) minutes, add full to volume of the mixer premixed Ecolit Foam Generation liquid turn 60-90 sec. Mortar should be pumped into formwork within Five (5) minutes. The formwork shall be leak-proof. ECOLIT Lightweight DRY MIX should be applied in accordance ECOLIT METHOD'S OF INSTALLATION STATEMENT. Available in grey color. NOTICE: during operation at above 30°C, an applied surface for the dry mix should be moistened.

ECOLIT lightweight concrete CHARACTERISTICS								
Binder	Ordinary grey portland cement							
Dry density (kg/m ³ , ±50 kg/m ³)	250	300	400	500	600	800	1000	Standard employed
Compressive strength (n/mm ²)	0.7	1	1.5	2.0	3.2	5	10	GSO EN 771-4:2008 (E)
Drying shrinkage (mm/m)	3	2.7	2.5	2.0	1.5	1.3	1.1	BS EN 680
Sorption humidity (%)	5.7	5.5	5.2	4.5	4.2	4	3.5	BS EN 772-11:2008
Fire resistance (hours)	4							BS 476 PART 22:1987
Water vapor permeability (mg/m ² *h*pa)	≥ 0.1							ASTM E 96
Thermal conductivity (w/mk)	0.06	0.09	0.11	0.13	0.15	0.21	0.32	ASTM C 518

ECOLIT lightweight concrete may be produced in accordance with customers required characteristics