ULTRACHEM
For Construction Chemicals

Ultra - Floor SL

Flow applied .05 - 4 mm thickness
Self-leveling Epoxy Flooring

ألترا فلور اس إل

مونة إيبوكسية من ثلاث مركبات ذاتية التسوية.

EPOXY FLOORING

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Uses

Ultra - Floor SL is designed for use in wide range of industrial environments where a lasting solution to Coat maintenance problems is required. It provides a dense. impervious, colored and chemically resistant Coat surface which is hygienic and easy to clean. Typical applications include:

- Food, Chemical and pharmaceutical industries.
- Kitchens & Offices & Schools.
- Electric Plants & Show rooms & Canteens.
- Laboratories & Hospitals.
- Production areas Shops & Supermarkets Garages.
- Warehouses & Stores.
- And any area where a hard wearing, hygienic, dust free and chemical Resistence is required.

Advantages

- Fast application - minimises downtime
- Chemically resistant - good resistance toa wide range of chemicals
- Durable - good abrasion resistance
- Hygienic - provides a dense, impervious, seamless Coat surface which is easily cleaned
- Attractive - available in a wide range of colors to enhance the working environment
- Solvent-free
- Odorless epoxy
- Excellent adhesion to concrete
- Smooth surface & Easy to clean.
- Impervious, seamless floor Suitable for the Middle East conditions.

Description

Ultra - Floor SL is a three components solvent-free self leveling epoxy mortar based on a combination of Specially selected fillers and high strength epoxy resins, that when mixed Provides .05-4 mm. Epoxy resin floor topping with a unique laying properties. **Ultra - Floor SL** is supplied in per-weighed packs, part (A),part (B)and Aggregate (C) that are ready to mix and to apply. **Ultra - Floor SL** consists of graded aggregates bound in a pigmented epoxy resin binder. It is supplied as a four component system, preweighed for on-site mixing. When laid, it provides a smooth, light-reflective surface. It is available in a range of standard colors.

Specification

Flow-applied epoxy Coat topping

The designated Coat areas shall be surfaced with thick flow - applied epoxy resin Coat topping. The topping shall achieve a compressive strength of 50 N/mm2 and a flexural strength of 34 N/mm2 at 7 days when tested to BS 6319. At 35 °C, it shall be capable of accepting foot traffic at 24 hours and vehicular traffic at 48 hours.

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properties

The values given below are average figures achieved in laboratory tests. Actual values obtained on site may show minor variations from those quoted.

	@25 °C
Color	Grey (other required colors)
Solid Content (by weight)	100%
Density	1.85 ± 0.2 kg/L
Application thickness	0.5 - 2.5 mm
Mixing ratio, A: B: C by weight	1.5 A : 1B: 3C-- (1 epoxy A+B): 1.5 C -filler)
Pot Life	1 hour
Complete cure	7 days
Initial setting time	8 hours
Final setting time	24 hours
Full hardness	7 days
Min. Application temperature	10° C
Rate of use (theoretical)	1- 6.5 kg /m2 (depending on surface conditions and thickness require)
Compressive strength	@ 25 °C @7 days (BS 6319 pt 2) 80 N/mm^2
Flexural strength	@ 25 °C @7 days (BS 6319 pt 2) 80 N/mm^2
Tensile strength	@ 25 °C @7 days (BS 6319 pt 2) 50 N/mm^2
Adhesion strength **to concrete** ASTM C882	2.5 N/mm^2(concrete failure)
Adhesion strength **to steel** ASTM C882	3.5 N/mm^2
Abrasion resistance	0.9 mm loss in thickness
Bacteria and fungi iso 22196 ASTM C1338	60 - 100 %

Chemical resistance

Ultra - Floor SL is resistant to spillages of the following, when tested in accordance with ASTM D 1308 Cl. 3.1.2.:

Acids (m/v)			
HCL	30%	:	Resistant
H2SO4	30%	:	Discolors
Citric acid	30%	:	Resistant
Acetic acid	10%	:	Resistant
Alkalis(m/v)			
NaOH	50%	:	Resistant
KOH	50%	:	Resistant
Solvents & organics			
Petrol		:	Resistant
Skydrol		:	Resistant
Diesel		:	Resistant
Brake fluid		:	Resistant
Engine oil		:	Resistant
Kerosene		:	Resistant

Aqueous solutions			
Water (Tap/distilled/potable)		:	Resistant
Sodium Chloride	(Sat)	:	Resistant
Urea solution	(Sat)	:	Resistant

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New concrete Coats

New concrete, or cementitious substrates, should be at least 28 days old and have a moisture content not exceeding 5%. Laitance deposits on new concrete are best removed by light grit blasting mechanical scabbling or grinding.

Old concrete Coats

Existing concrete Coats which require refurbishment must be prepared to ensure a strong adhesive bond between the Coating system and the existing Coat. Mechanical cleaning methods are strongly recommended particularly where heavy contamination by oil and grease has occurred or existing coatings are present. To ensure adhesion, all contamination should be removed. Proprietary chemical degreaser may be used on small areas of light contamination only.

Steel surfaces

Steel surfaces should be degreased and grit blasted to SA 21/2 immediately prior to application. The prepared surface should than be treated with one coat of **Ultra - Prime SB** or **Ultra - Prime SF.**

Priming

All surfaces treated with **Ultra - Floor SL** should be primed with **Ultra - Prime SB** or **Ultra - Prime SF.** designed for maximum absorption and adhesion to concrete substrates. Add the entire contents of the hardener tin to the base tin and mix the two primer components thoroughly for at least 2 minutes - under no circumstances should part mixing be considered. Once mixed, the primer should be applied immediately to the prepared substrate using stiff brushes and /or rollers. The primer should be well scrubbed' into the substrate to ensure full coverage, but care should be taken to avoid over application or bonding. Allow the primer to dry (see table below) before proceeding to the next stage, do not proceed whilst the primer is tacky as this will lead to unsightly marks in the finished surface. Porous substrates may require a second primer coat when the first coat is directly absorbed into the substrate - but minimum over coating times must still be observed (see table below). The minimum over coating times will vary slightly according to the porosity of the substrate. However, they should be in accordance with the following ambient application temperatures.

20 °C	8 - 12 hour
30 °C	6 - 8 hour
40 °C	4 - 6 hour

Mixing

Ultra - Floor SLL is supplied in four pre-weighed packs (base, hardener, aggregate and color Pack) which are ready for immediate on-site use. Part mixing of these components is not acceptable and will affect both performance and appearance of the finished Coat, and would furthermore automatically invalidate **U.n.C.**
standard product guarantee.

Mixing should be carried out using either a forced action mixer. or a heavy duty, slow-speed drill fitted with **U.n.C.** mixing paddle Mr4. All such equipment should be of a type and capacity approved by **U.n.C.** The components should be mixed in a suitably sized mixing vessel. The color pack should be added to the base container and mixed for 15 - 30 seconds, until homogeneous. Then add the hardener and mix for further 30 seconds, until an even color and texture is obtained. Thereafter, the contents of the graded aggregate pack should be slowly added and mixing carried out for a further 3 minutes until a completely homogenous material is obtained.

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Chemical properties

Ultra - Coat SL has good resistance at ambient temperatures to a wide range of industrial chemicals. Specific data is available on request. Note that it is especially important that spillage is cleaned u quickly since much higher concentrations of chemicals may occur on evaporation. For details of other chemicals, please contact **U.n.C.** office.

Design criteria

Ultra - Floor SL is designed for application at a nominal thickness of 2mm. Substrates should be dry and not suffer, or be likely to suffer, from rising damp. If necessary, suitable damp-proof membranes should be installed to prevent this. Substrates should not have a relative humidity greater than 75% at the time of installation.

Instructions for use

Ultra - Floor SL should be applied by specialist contractors who must follow the procedures laid down in the Product Method Statement. **U.n.C.** works with a network of such applicators who have been trained in the correct installation procedures. The following steps are involved in the application which would normally take place over a 2 to 3 day period.

Surface Preparation

It is essential that **Ultra - Floor SL** is applied to sound, clean and dry surfaces in order that maximum bond strength is achieved between the substrate and the Coating system. All dust and debris should be removed prior to application of the product or its primer.

Application

The applicator should ensure that there are sufficient supplies of plant, labour and materials to make the mixing and subsequent application process a continuous one for any given, independent Coat area. Once mixed, the material must be used within its specified pot life - see (Properties) section. The material should be poured onto the prepared and primed substrate as soon as mixing is complete. It should be spread to the required thickness using a serrated trowel, with care taken not to overwork resin, spreading evenly and slowly. Immediately after laying, the material should be rolled, using a spiked nylon roller, to remove slight trowel marks, and to assist air release. The rolling should be carried out using a back and forth technique along the same path. An overlap of 50 % with adjacent paths is recommended. Further light rolling may be required to remove surface imperfections, or for subsequent release of trapped air, ut should be prior to the setting of the product.

Coat Joints

All existing expansion or movement joints should be followed through the new Coat surface. Joint sealant & joint geometry should be compatible with the Coat type used، intended exposure conditions and likely movement characteristics of the substrate-consult **U.n.C.** Office for more details.

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Cleaning

Ultra - Prime SB, Ultra - Prime SF and **Ultra - Floor SL** should be removed from tools and equipment with **Chem - Solvent** immediately after use. Hardened material can only be removed mechanically.

Maintenance

The service life of a Coat can be considerably extended by good housekeeping. Regular cleaning may be carried out using a rotary scrubbing machine with a water miscible cleaning agent at temperatures up to 50 °C.

Limitations

Ultra - Coat SF should not be applied on to surfaces known to, or likely to suffer from, rising dampness' potential osmosis problems or have a relative humidity greater than 75 % as measured in accordance with BS 8203 Appendix A, or by a Hammond concrete / mortar moisture tester type COCO.

In areas where significant hermal shock is likely to occu, for e.g. cold rooms etc., please consult **U.n.C.** office.

Ultra - Floor SL should not e applied to asphalt, weak or friable concrete, unmodified sand / cement screeds, PVC tiles or sheet or substrates known to move substantially.g. steel walkways. For information on other substrates, consult **U.n.C** office.

Ultra - Floor SL should not be installed at temperatures below 10°C or above 45°C. If in doubt, or for application outside these temperature limits, please consult your nearest **U.n.C.** office.

In common with all epoxy materials some light shade changes may be experienced over he long term when placed in adverse exposure conditions. Any such change in shade is not regarded as being detrimental to performance.

Estimating

Supply

Ultra - Floor SL	25 kg pack(10 Kg Epoxy & 15 Filler)
Ultra - Solvent	4 litre pack

Coverage

Chem - Floor SL

15.5 m^2/ pack @ 1 mm thickness
7.8 m^2/ pack @ 2 mm thickness
5.2 m^2/ pack @ 3 mm thickness
3.9 m^2/ pack @ 4 mm thickness

Note the coverage figures given are theoretical due to wastage factors and the variety and nature of possible substrates, practical coverage figures will be reduced. Typically, an additional 10 %should be allowed for surface irregularities and wastage although this will vary with site conditions.

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Storage

Shelf life

Ultra - Floor SL has a shelf life of 12 months if kept in warehouse conditions at 30°C in the original, unopened pack.

Storage conditions

Store in dry conditions between 5°C and 30°C, away from sources of heat and naked flames, in the original, unopened packs. If stored at high temperatures the shelf life will be reduced.

Health and safety

Ultra - Floor SL, Ultra - Prime SB or **Ultra - Prime SF** and **Ultra - Solvent** should not come in contact with the skin and eyes, or be swallowed. Ensure adequate ventilation and avoid inhalation of vapours. Some people are sensitive to resins, hardeners and solvents. Wear suitable protective clothing, gloves an d eye protection. In case of contact with skin, rinse with plenty of clean water, then cleanse with soap and water. Do not use solvent. In case of contact with eyes, rinse immediately with plenty of clean water and seek medical advice. If swallowed seek medical attention immediately - do not induce vomiting.

Fire

Ultra - Prime SB, Ultra - Prime SF and **Chem - Solvent** are flammable. Keep away from sources of ignition. No smoking. In the event of fire extinguish with Co_2 or foam. Do not use a water jet.

Ultra - Coat SL is non-flammable.

Flash Points

Ultra - Prime SF	Over 100°C
Ultra - Prime SB	55°C
Ultra - Solvent	33°C

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Quality You Can Trust

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المنطقة الصناعية - أبو رواش - الكيلو 26
طريق القاهرة الإسكندرية الصحراوي
شارع عادل والي - قطعة رقم 91

النشرة الفنية

ألتـــــــرا كيم
لكيماويات البـــــــناء

ألترا فلور اس إل

مونة إيبوكسية من ثلاث مركبات ذاتية التسوية.

وصف المنتج

مونة إيبوكسية ذاتية التسوية خالية من المذيبات من ثلاث مركبات لإعطاء أرضيات إيبوكسية فائقة التحمل ذو مقاومة عالية للكيماويات بألوان مختلفة.

الإستعمالات

- مصانع الأغذية والأدوية والكيماويات.
- المستشفيات والمطابخ والمخازن والسوبر ماركت.
- جميع المناطق التي تتطلب مقاومة عالية للكيماويات أو درجة عاليةمن التعقيم أو مقاومة عالية للأتربة.
- المعامل والغرف المعرضة للأشعة.
- محطات الكهرباء والمياه.
- المعارض والمكاتب وغرف العرض والتدريب.

المميزات

- تطبيق س ريع فالمنتج سهل الخلط والتشغيل.
- يوفر سطحاذو قوه ومتانه عاليه ومقاومة ميكانيكية فائقة للبري والإحتكاك.
- خالي من المذيبات وعديم الرائحة.
- صحي حيث يوفر سطح طبقة كثيفاً ومنيعاً وسلساً يمكن تنظيفه بسهولة ويقاوم نمو البكتريا والفطريات.
- مقاومة فائقة لمدى واسع من الكيماويات.
- متوفر بعدة ألوان حسب الطلب.

البيانات الفنية

(عند 25 درجة مئوية)

اللـــون	:	رمادي - أصفر - أخضر - أزرق - ألون أخرى عند الطلب
التعبـئة	:	ألترا - فلور إس إل مجموعة 25 كجم
	:	ألترا - فلور إس إل مجموعة 16 كجم
الصلاحية	:	24 شهر من تاريخ الإنتاج في عبواته المغلقة
التخزيـن	:	في مكان جاف بعيدا عن التعرض لأشعة الشمس

معدل الإستخدام

ألترا فلور إس إل 3 - 3.5 كجم / م 2 / لسمك 2 مم.

ألتـــــــرا كيم
لكيماويات البـــــــــناء

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التطبيق والإستخدام

إعداد السطح :

- يتم تنظيف الأسطح المراد دهانها جيدا من الأتربة وساقط المونة والمواد البترولية والشحومات.

البرايمر :

- يتم دهان طبقة من ألترا إيكو برايم ويتم ترك طبقة البرايمر حتى الجفاف الإبتدائي.
- يتم سحب طبقة معجون إيبوكسي بإستخدام ألترا بتي إي بي بعد جفاف طبقة البرايمر.

خلط المونة الإيبوكسية ألترا فلور إس إل :

- يتم إضافة محتوى عبوة المصلب إلى عبوة الأساس ويتم التقليب حتى الحصول على قوام متجانس ثم يتم إضافة الفيلر بالتدريج مع التقليب حتى الحصول على قوام المونة الإيبوكسية المتجانس ذاتي التسوية.

التطبيق :

- يتم صب ألترا فلور إس إل على الأرضيات التي تم إعدادها ويتم التوزيع بإنتظام بإستخدام بروة مسننة من البلاستيك أو الصلب حسب السمك المطلوب ثم عمل التهوية بإستعمال الرولة المسمارية.




تعليمات الأمان

- يتم تنظيف أدوات التطبيق بعد إنتهاء الإستخدام مباشره قبل الجفاف والإ سيتم التنظيف ميكانيكا بعد الجفاف.
- غير سامة طبقا لقواعد الصحة والأمان السائدة.
- يجب إرتداء الملابس الواقية المناسبة والقفازات وحماية العين ومعدات حماية الجهاز التنفسي.
- عند التلامس مع الجلد يجب الغسل فورا بالماء والصابون وإذا حدث تلامس مع العين أو الأغشية المخاطية يجب الشطف بالماء الدافىء وإستشارة الطبيب المختص.

لمزيد من التفاصيل ارجع إلى الداتا شيت باللغه الانجليزيه أو اتصل على الإداره الفنية.

جودة تستحق الثقة

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