



Technical Data Sheet

URAGARD HT110W

Product Description

Uragard HT110W is a general-purpose polyurethane resin screed offering excellent abrasion resistance, chemical resistance and thermal shock resistance. Uragard HT110W maintains a level of relative flexibility after cure, and provides a fine to medium anti-slip profile as a trowel finished screed. The system can be completed with an optional glazed sealer coat to aid cleanability. Uragard HT110W is also particularly suitable as an infill material. Bulked out with pea-gravel, this system can be used to infill voids, level out spaulded substrates and as a general fast cure 'concrete'.

Key Benefits

- Anti-slip surface
- Fast curing, single application
- Excellent chemical resistance
- Excellent impact and wear resistance
- Excellent temperature resistance
- Easy to clean
- Optional biocide additive resistance

Technical Data

John L. Lord & Son Ltd is an ISO 9001:2008 accredited company and all products are manufactured strictly to ISO quality standards.

Physical Properties

Complies with BS 8204-6 / FeRFA Type 6, System Make-Up:

Primer(s):	1 coat Uragard primer
System:	1 application Uragard HT110W
Sealer Coat(s):	None
Optional Variations:	Biocide additive, glazed sealer coats (Uragard SC2 or MB12)

System Details:

Finish Seal:	Resin rich anti-slip, optional matt or gloss sealer
Thickness:	6mm to 9mm
Colours:	Grey, Red, Green, Buff, Cream or Terracotta

Chemical Resistance

Resistant to a wide range of chemicals including sugars, alkalis and most acids (organic and inorganic). For full details consult the John Lord Technical Dept.

Note: Light discolouration or staining may occur when exposed to some chemicals based on the nature of the spill and cleaning regime followed.

Performance Data

Compressive Strength:	53 N/mm ²
Compressive Modulus:	9850 N/mm ²
Flexural Strength:	17 N/mm ²
Flexural Modulus:	2400 N/mm ²
Tensile Strength:	5.5 N/mm ²
Bond Strength to Concrete:	Exceeds cohesive strength @ 30N/mm ²
Tensile Modulus:	450.3 N/mm ²
Temperature Resistance:	Constant -25°C to 85°C Occasional spillages of up to 120°C at 9mm thickness
Flash Steam Cleanable:	Yes
Water Permeability:	Nil

Uragard HT110W is classified as Low Slip Potential Flooring (when dry) and Moderate Slip Potential Flooring (when wet) as described in 'The Assessment of Floor Slip Resistance: The UKSG Guidelines issue 4 / 2011'. Results were obtained from tests carried out by the Health and Safety Laboratory (HSL) and from our own internal laboratory tests.

Continued slip resistance can only be maintained if the guidelines in the HSE's STEP tool (Slips and Trips eLearning Package) are followed.

All figures are measured and expressed under laboratory conditions: Actual performance may vary from the above values depending upon site conditions.

Curing Time

A completed resin floor can go into service after the following minimum cure period at 18°C and above:

Light Traffic:	16 hours
Heavy Traffic:	48 hours

Other Products

The following products are recommended for use with Uragard HT110W:

- Uragard WR resin render screed
- ASPEN Stainless steel drainage systems
- ASPEN Stainless steel wall support kerbing system



Shelf Life and Storage

The product should be kept in its original unopened container until use.

The product should be stored in weather tight conditions at temperatures between 10°C and 25°C, avoiding direct sunlight. Under these conditions this product has a shelf life of up to 6 months.

Application Information

John Lord recommends that all products are installed by their own Contracts Department who provide a professional service with experienced Project Management supervision and skilled, trained and NVQ/CSCS approved employees.

Suitable Applications

- Food Processing
- Brewing and Beverage
- Dairy Processing
- Pharmaceutical
- Chemical Processing and Storage
- As a high strength, fast cure concrete alternative

Substrate Suitability and Preparation

A separate technical data sheet is available on 'Substrate Suitability and Preparation'.

Application Temperature

Correct temperature is critical to the successful application of Uragard HT110W and air temperatures should be maintained between 15°C and 25°C during the application and curing period of this product. We also strongly recommend that the application area is heated to temperatures of between 15°C and 25°C for up to 24 hours prior to application to allow the ambient and substrate temperatures to regulate before the application commences. Materials should also be kept in a warm area of 12°C minimum temperature for 12 hours prior to application. De-humidifiers must be used where high humidity conditions prevail. Ensure adequate ventilation during application

Priming

The dry, prepared, dust-free substrate should receive a roller-applied tack coat of Uragard primer. After between one and three hours tack off time the Uragard HT110W can be applied.

System Application

The Uragard HT110W should be mixed and trowel applied to a thickness of between 6mm and 9mm.

Uragard HT110W Infill Grade

Uragard HT110W can be modified to create a 'resin concrete' by addition

of between 5kg and 12kg of washed, dried, single-sized 6mm pea gravel. This bulked out formulation retains a high level of strength; greater than most concretes, whilst offering next or, in some circumstances, same day overlaying. The inbuilt flexibility of the system reduces the risk of shrinkage during cure and thus avoids reflective cracking in the overlaid finish screed.

Joints

All known expansion joints should be followed through the resin floor finish using Epiflex Jointing Mastic. If concrete movement or cracking takes place after application then reflective cracking of the topping may occur.

Note: The texture of Uragard HT110W on the finished floor surface may appear banded or slightly variable. This is a natural, visual aspect of the system, which can also be influenced by atmospheric conditions and is not defective in anyway. Polyurethane systems have limited colour stability which can result in discoloration of the floor over a period of time upon exposure to UV light. Our standard colour range has been carefully chosen to provide a colour range limiting the extent of discoloration.

In-Service Maintenance

Good housekeeping and regular cleaning can considerably extend the service life of a resin screed floor and will enhance the floor's appearance and reduce soiling tendencies.

Suitable cleaning methods for this product include:

- Rotary scrubbing machine or hot water washing (up to 85°C) with suitable detergent products – see John Lord Cleaning Guide for further details.
- Flash steam clean is suitable on an occasional basis.

Statement of Responsibility

The technical data and application information within this John Lord Technical Data Sheet is provided as an introduction to the system only and may vary according to on-site or environmental conditions. As the information provided is of a general nature, no guarantee is implied and it is the responsibility of the client or user to discuss in detail with John L. Lord & Son Ltd the suitability of the product for a particular application. John L. Lord & Son Ltd cannot accept any responsibility for work and the subsequent performance of their systems that are not controlled by their own contracting services.

John L. Lord & Son Ltd reserve the right to alter information contained in this document without prior notification; it is the responsibility of the client or user to obtain the most recent issue.