



3M™ Scotchkote™ System Application Guide

High Performance Coating System For Concrete Floors

SKF.28 - Issue 2

Surface Preparation & Cleaning	As required
Concrete Repairs - (Where Required)	3M™ Scotchkote™ Epoxy Concrete Repair 474 Theoretical coverage rate at 6mm is 0.08m ² /kilo
Primer Application - (Where Required)	3M™ Scotchkote™ Urethane Sealer 165 CS @ 100μ dft Theoretical coverage rate at 100μ is 10m ² /litre
Finish Application	3M™ Scotchkote™ Fast Curing Floor Coating XF 895 2 coats @ 150 - 200μ dft per coat Theoretical coverage rate at 200μ is 5m ² /litre

Surface Preparation

Ideally, all concrete should ideally have an effective damp proof membrane.

Oil and grease spots and spills should be removed by detergent washing, solvent washing or sweating out with hot compressed air prior to the following methods of surface preparation.

Surfaces should then be thoroughly abraded using diamond grinding or floor blasting equipment, both fitted with dust capture equipment, to ensure surface laitance and all traces of any existing coatings are removed.

All residual dust and abrasive residue must be swept or vacuumed from the surface.

The use of scabbling equipment is not recommended.

Prior to any coating, the concrete should be dry and the moisture content should be checked using a proprietary surface moisture indicator, such as an Elcometer 7420 Digital Moisture Meter. When tested in accordance with the manufacturer's instructions, the reading should be classified as 'dry.'

Porous Concrete then requires priming with **3M™ Scotchkote™ Urethane Sealer 165 CS**.

Damaged and eroded areas should be repaired using **3M™ Scotchkote™ Epoxy Concrete Repair 474** in accordance with the product technical data sheet and as described later.

Uneven or rough surfaces should be planed flat/smooth. Rough surfaces may induce unnecessary wear on peaked areas.

Any mastic within expansion joints must be removed prior to coating. This can be replaced where necessary after the flooring system has fully cured.

3M™ Scotchkote™ System Application Guide

SKF.28

Application Of Scotchkote 3M™ Scotchkote™ Epoxy Concrete Repair 474 - (Where Required)

Surfaces should be clean and dry.

Scotchkote Epoxy Concrete Repair 474 should be applied over a tack coat of **3M™ Scotchkote™ Epoxy Repair Primer 080**

Scotchkote Epoxy Repair Primer 080 is a two component epoxy primer comprising of a Part A (Base) component and a Part B (Activator) component. The contents of the Part B (Activator) container should be added to the Part A (Base) container and stirred thoroughly to produce a homogeneous mix. The mixed product should be applied by brush and must be stippled into the concrete surface.

The **Scotchkote Epoxy Repair Primer 080** must not be allowed to dry prior to application of the **Scotchkote Epoxy Concrete Repair 474** .

Scotchkote Epoxy Concrete Repair 474 is a three component epoxy screed comprising Part A (Base), Part B (Activator) and Aggregate components. The Part A (Base) and Part B (Activator) components must be mixed together first, before adding the Aggregate. To ensure complete mixing of large quantities it is recommended that a mechanical mixer of the Mixal, Hobart or Danes type is used. Mixing should continue for at least 3-4 minutes after all the aggregate is added.

The mixed **Scotchkote Epoxy Concrete Repair 474** should be used within 70 minutes of mixing.

Scotchkote Epoxy Concrete Repair 474 must be applied to the wet **ThorScotchkote Epoxy Repair Primer 080** and must be compacted into the area to be repaired and floated flush with the surface of the surrounding floor.

Scotchkote Epoxy Concrete Repair 474 is hard dry after 8 hours at 20°C.

3M™ Scotchkote™ System Application Guide

SKF.28

Application Of 3M™ Scotchkote™ Urethane Sealer 165 CS - Where Required

Very porous concrete surfaces should be primed with **Scotchkote Urethane Sealer 165 CS**

Surfaces to be coated should be clean and dry.

Scotchkote Urethane Sealer 165 CS is a two component material which should be mixed together immediately prior to use to ensure the material is completely homogeneous and should be applied at 100 microns dft.

The theoretical coverage rate at 100 microns is 10m²/litre.

On rough surfaces **Scotchkote Urethane Sealer 165 CS** should be stippled into the surface to ensure complete wetting of the substrate.

Scotchkote Urethane Sealer 165 CS can be overcoated after a minimum drying interval of 3 hours and within 24 hours at 20°C. The following table is given as a guide for different temperatures.

	MINIMUM	MAXIMUM
10°C	6 hours	48 hours
15°C	4 hours	36 hours
20°C	3 hours	24 hours
25°C	2 hours	18 hours
30°C	1½ hours	12 hours

3M™ Scotchkote™ System Application Guide

SKF.28

Application Of Two Coats Of 3M™ Scotchkote™ Fast Curing Floor Coating XF 895

The prepared or primed surface should be clean, dry and free from loose material.

Where alternate colours are being applied alongside each other for identification/safety-marking, the area to be treated by each colour should be defined by masking tape. This masking tape should be removed as soon as each coat is touch dry, and replaced before the next coat/colour is applied to ensure ease of removal.

Scotchkote Fast Curing Floor Coating XF 895 is a fast curing two component solvent free coating comprising of Part A (Base) and Part B (Activator) components. The Part A (Base) component should be stirred, then whilst continuing stirring the contents of the Part B (Activator) container should be added and thoroughly mixed. After mixing, the product should be transferred to a clean container and the Part A (Base) container scraped out and further mixing carried out.

The material can be applied by brush, roller or a pour and roll technique at a nominal wet film thickness of 150-200µ. When using a pour and roll technique the mixed material should be poured over the approximate area to be covered then rolled out to the required thickness, large pools of mixed product must be avoided.

The theoretical coverage rate at 200µ is 5m²/litre.

When coating complex areas which require cutting in, these areas should be coated immediately prior to the main area being coated, to ensure complete blending of 'wet edges.'

The first coat of **Scotchkote Fast Curing Floor Coating XF 895** should be overcoated with the second coat after a minimum period of 1 hour at 20°C and within 24 hours, these times will be extended at lower temperatures and reduced at higher temperatures.

Where a slip resistant finish is required **3M™ Scotchkote™ Granular Aggregate WD 093** should be scattered over the second coat of **Scotchkote Fast Curing Floor Coating XF 895** and back rolled in.

This system is suitable for light pedestrian traffic after a minimum of 1 hour at a surface temperature of 20°C.

3M™ Scotchkote™ System Application Guide

SKF.28

Notes

Document References

3M™ Scotchkote™ Epoxy Concrete Repair 474

Product Technical Data Sheet

3M™ Scotchkote™ Urethane Sealer 165 CS

3M™ Scotchkote™ Fast Curing Floor Coating XF 895

3M and Scotchkote are trademarks of 3M Company.

Important Notice

All statements, technical information, and recommendations related to 3M's products are based on information believed to be reliable, but the accuracy or completeness is not guaranteed. Before using this product, you must evaluate it and determine if it is suitable for your intended application. You assume all risks and liability associated with such use. Any statements related to the product which are not contained in 3M's current publications, or any contrary statements contained on your purchase order shall have no force or effect unless expressly agreed upon, in writing, by an authorized officer of 3M.

Warranty; Limited Remedy; Limited Liability.

3M warrants that the 3M™ Scotchkote™ Product will conform to 3M published specifications upon shipment. If the product is proven not to have met the specifications your exclusive remedy within 12 months of sale by 3M of the product and 3M's sole obligation will be, at 3M's option, to replace the Product or to refund the purchase price of the Product. **Except where prohibited by law, this warranty is made in lieu of all other warranties, express or implied, including, but not limited to, any implied warranty of suitability or fitness for a particular purpose, or those arising from a course of dealing, custom or usage or trade.**

3M has no obligation under this warranty with respect to any product that has failed due to inadequate or improper storage, handling, surface preparation, application, or maintenance; failure to follow product instructions or recommendations or alteration or damage to the Product caused by accident, neglect, or misuse. **OTHER THAN IN THE CASE OF DEATH OR PERSONAL INJURY CAUSED BY ITS NEGLIGENCE AND EXCEPT WHERE PROHIBITED BY LAW, IN NO EVENT SHALL 3M BE LIABLE FOR ANY DIRECT, INDIRECT, SPECIAL, INCIDENTAL OR CONSEQUENTIAL LOSS OR DAMAGES (INCLUDING LOST PROFITS) ARISING FROM THIS PRODUCT, REGARDLESS OF THE LEGAL THEORY ASSERTED.**



Electrical Markets Division (EMD)

3M United Kingdom plc
23 Standard Way Industrial Estate
Northallerton
North Yorkshire DL6 2XA
United Kingdom
Phone: +44 (0)1609 780170
www.3M.co.uk/scotchkote

Electrical Markets Division (EMD)

3M United Kingdom plc
3M Centre
Cain Road, Bracknell
Berkshire RG12 8HT
Phone: 01344 858000
Fax: 01344 857970
www.3M.co.uk

Please recycle. Printed in UK.
© 3M 2015 All rights reserved.
SKF.28 - 03/15