

SPECTRALOCK[®] 2000 IG

DS-300-0325

Globally Proven Construction Solutions



1. PRODUCT NAME

SPECTRALOCK® 2000 IG

2. MANUFACTURER

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3. PRODUCT DESCRIPTION

SPECTRALOCK 2000 IG is a highly chemical resistant industrial grade epoxy grout for ceramic tile, pavers, floor brick, packing house tile, and stone. SPECTRALOCK 2000 IG is supplied as factory proportioned kits consisting of epoxy resin, hardener, and silica filler.

Equipped with Microban Anti-Microbial Protection.

Uses

Use in corrosive environments such as:

- Industrial: bakeries, dairies, cheese factories, breweries, CIP rooms, meat packing plants, soft drink plants, confectioneries, canneries, distilleries, pharmaceutical factories, veterinary hospitals, clinics and kennels.
- **Commercial**: institutional kitchens, fast food restaurants, cafeterias, laboratories, supermarkets.

Advantages

• High chemical resistance

- Improved temperature resistance ideal for cold rooms and walk in refrigerators
- Maximum physical strength
- Rapid setting grout walkable after 8 hours
- Equipped with anti-microbial technology to protect the treated article
- · Highly resistant to bacteria attack
- Water cleanable
- Greenguard certified low VOC emissions, better indoor air quality
- Fast curing, even at low temperatures
- Conforms to EN 13888 RG
- Exceeds ANSI 118.3 (Epoxy) and ANSI 118.5 (Furan) performance requirements

Suitable Substrates

- Tile
- Natural Stone

Packaging

#2 Unit Pail Kit - 11.2 kg kit; 36 kits per pallet:

- 2 x Part A (each 1.15 lbs / 0.52 kg)
- 2 x Part B (each 2.13 lbs / 0.98 kg)
- 2 x Part C (each 9 lbs / 4.1 kg)
- 2 White Cleaning Pad

All colours: These products are recommended to be used within applications such as commercial "front-of-house" and other general commercial and industrial type projects.

Approximate Coverage / Consumption

APPROXIMATE KG PER 10 M² OF TILED SURFACE

Tile Size (mm)	Joint Width (mm)					
	3	4	6	8	10	12
100 x 100 x 6	5.9	7.9	11.9	15.8	19.8	23.8
75 x 150 x 7	6.9	9.2				
150 x 150 x 9	5.9	7.9				
120 x 240 x 12		9.9	14.9	19.8	24.8	29.7
200 x 200 x 9	4.5	5.9	8.9	11.9	14.9	17.8
200 x 200 x 14		9.2	13.9	18.5	23.1	27.7
300 x 300 x 10	3.3	4.4	6.6	8.8	11.0	13.2
300 x 600 x 10	2.5	3.3	5.0	6.6	8.3	9.9
450 x 450 x 10	2.2	2.9	4.4	5.9	7.3	8.8
600 x 600 x 10	1.7	2.2	3.3	4.4	5.5	6.6
600 x 1200 x 10	1.2	1.7	2.5	3.3	4.1	5.0
150 x 800 x 10	3.9	5.2				
200 x 800 x 10	3.1	4.1				
150 x 1500 x 10	3.6	4.8				
200 x 1500 x 10	2.8	3.7				
150 x 1700 x 10	3.6	4.8				
200 x 1700 x 10	2.8	3.7				
1000 x 1000 x 6	0.6	0.8	1.2			
1500 x 3000 x 6	0.3	0.4	0.6			

Shelf Life

Factory sealed containers of this product are guaranteed to be of first quality for the time listed below if stored at temperatures greater than 32°F (0°C) and less than 95°F (35°C). Part A & B Liquids – two (2) years Part C Powder – no limit* *High humidity will reduce the shelf life of bagged product.

Limitations

- SPECTRALOCK 2000 IG in all colours (except for #Bright White) is recommended for use in commercial "front-of-house" and other general commercial and industrial type projects; for areas where there is heavy use of no-rinse cleaners, commonly known as "backof-house" installations such as commercial kitchens, we recommend the use of #22 Midnight Black. Please contact Technical Services for details (technicalservices@laticreteeurope.com).
- Maximum chemical resistance is achieved in seven (7) days at 70°F (21°C). Protect from exposure to strong chemicals until fully cured; at colder temperatures it takes longer to achieve full cure.
- Grouts for ceramic tile, pavers, brick and stone are not replacements for waterproofing membranes. When a waterproofing membrane is required, use a

LATICRETE[®] Waterproofing Membrane (see Section 10 FILING SYSTEM).

- Please consult with LATICRETE Technical Services for specific recommendations, if grout will be exposed to chemicals other than those indicated on the chemical resistant chart.
- For interior use only.

Cautions

Consult SDS for more safety information.

- Protect finished work from chemical exposure, dirt and traffic until fully cured.
- Until cured, SPECTRALOCK 2000 IG may irritate eyes and skin. Avoid contact with eyes and or prolonged contact with skin. In case of contact, flush thoroughly with water.
- Do not take internally. Silica sand may cause cancer or serious lung problems. Avoid breathing dust. Wear a respirator in dusty areas.
- Because propane gas heaters will cause epoxy grouts to yellow, refrain from using such heaters or properly vent all exhaust.
- Epoxy resins may affect the color of white or porous stones (such as White Carrara, Thassos white, royal Danby, etc.).
- Test stones for compatibility with water and cleaning additive mixture.
- Conduct a test area to determine compatibility with metal or steel tile.
- Keep out of reach of children.

4. TECHNICAL DATA

MICROBAN





VOC/LEED Product Information

This product has been certified for Low Chemical Emissions (ULCOM/GG UL2818) under the UL GREENGUARD Certification Program for Chemical Emissions for Building Materials, Finishes and Furnishings (UL 2818 Standard) by UL Environment.

Applicable Standard

- EN 13888 RG
- ISO 13007-1 RG

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- ANSI 118.3
- NSF* Registration #143530

• ISO 9001:2015 Quality Management System *NSF Registration assures inspection officials and end users that formulation and labels meet appropriate food safety regulation. NSF International launched its voluntary Non-food Compounds Registration Program in 1999 to re-introduce the previous authorization program administered by the U.S. Department of Agriculture (USDA).

Physical Properties

Basis:	Epoxy resins, aggregates, additives			
Colour:	Grey			
Apparent	Part A: 0.95 g/cm3			
Density:	Part B: 1.14 g/cm3			
Maximum Grain Size:	≤ 0.3 mm			
Flammability:	No			
Classification EN 13888:	RG			
	Value	Requirement	Test Method	
Abrasion Resistance:	~ 180 mm ³	≤ 250 mm³	EN 12808-2	
Flexural Strength (28 days):	~ 45 N/mm²	≥ 30 N/mm²	EN 12808-3	
Compressive Strength (28 days)	~ 80 N/mm²	≥ 45,0 N/mm²	EN 12808-3	
Shrinkage:	~ 0,6 mm/m	≤ 1,5 mm/m	EN 12808-4	
Water Absorption after 240 Minutes:	~ 0,005 g	< 0,1 g	EN 12808-5	

Service Temperature Range*			
Intermittent Exposure	< 182°C		
Constant Exposure	< 80°C		

*Service temperature exposure defined as:

• **Intermittent:** where hot materials, liquids or steam come in contact with grout for a short time.

• **Constant:** where grout is subjected to continuous heat such as under a bakery oven.

Working Properties

Consistency:	Creamy paste	
Wet Density:	1,50 g/cm³	
Working Time:	~ 80 minutes	
Application Temperature:	+7°C to +32°C	
Mix Ratio:	1 Part A : 1 Part B : 1 Part C	
Time to Foot Traffic:	~8 hours	
Time to Full-Service Conditions:	7 days*	

(at 21°C)

 ${}^{\star}\!$ for maximum resistance; lower temperatures may take longer to cure.

Time to Traffic

CURE TIME				
Floor Temperature	Time to Light Traffic*	Time to Heavy Traffic^	Full Cure⁺	
10°C	20 hours	32 hours	8 - 10 days	
16°C	11 hours	24 hours	7 days	
21°C	8 hours	16 hours	7 days	

*Foot traffic

[^]Place equipment

*Exposure to chemical and heat

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Chemical Resistance

Chemical Name	Continuous Exposure	Intermittent Exposure	Splash Exposure	
Food Acids				
Lactic to 10%	R	R	R	
Acetic to 10%	R	R	R	
Formic to 5%	R	R	R	
Citric to 50%	R	R	R	
Tartaric to 50%	R	R	R	
Tannic to 50%	R	R	R	
Oleic to 100%	R	R	R	
Phosphoric to 80%	R	R	R	
	Mineral A	Acids		
Hydroflouric acid 10% ¹	R	R	R	
Sulfuric to 50% ¹	R	R	R	
Nitric to 30% ¹	R	R	R	
Hydrochloric to ¹ 36.5%	R	R	R	
Corrosive Cleaners				
Sodium Hypochlorite¹ (Bleach) 3%	R	R	R	
Sodium Hydroxide (Saturated)	R	R	R	
Solvents				
Xylene	R	R	R	
Ethyl Alcohol	R	R	R	
Mineral Spirits	R	R	R	
Toluene	R	R	R	
Methylene Chloride	NR	NR	NR	
Gasoline	R	R	R	

Notes: Chemical Resistance determined in accordance with ASTM C267. Chemical Resistance defined as:

- **Splash:** minor spill wiped up quickly such as in a laboratory.
- Intermittent: exposure to chemicals where clean up takes place several times a day such as in a commercial kitchen.
- Continuous: heavy exposure to chemicals where clean up is less frequent such as in an industrial food plant.
- R=Recommended, NR=Not Recommended

¹ Long Exposure will cause color change.

Specifications subject to change without notification. Results shown are typical but reflect test procedures used. Actual field performance will depend on installation methods and site conditions.

5. INSTALLATION

Surface Preparation

Before starting to grout remove spacers and debris in grout joints and remove dust and dirt using a damp sponge. Allow to dry. Do not leave water standing in joints. Do not clean tiles with acid cleaners. Substrate temperature must be between 7°C and 32°C.

Note: Temperature will affect working properties of SPECTRALOCK 2000 IG. Warm temperatures will speed curing and shorten working time. Cool temperatures will slow curing and require longer time to traffic. Store SPECTRALOCK 2000 IG (including Part C) at 21°C for 24 hours prior to use.

Mixing

Pour SPECTRALOCK 2000 IG Part A and Part B into a clean mixing pail and mix thoroughly with a drill mixer until liquids are completely blended. Add all of the Part C powder. The mix will look thick at the beginning. Whip it thoroughly with high speed mixer (>450 rpm) until uniformly blended (at least 2 Minutes). This will aerate the grout to a very fluffy mix.

Application

For maximum pot life, remove grout from bucket and spread on floor or plastic sheeting. Spread the grout with sharp, firm rubber grout float. Work the grout paste into the joints. Insure the joint is filled and grout is not sitting on top. Remove excess grout from the face of the tiles with the edge of the grout float. Hold the float at 90° angle and pull it diagonally across the joints and tile to avoid pulling out the material.

Initial Cleaning: Use Initial Wash Cleaning Additive

Once grout has been spread, wait approximately 30 minutes at 21°C prior to beginning initial wash. Add Initial Wash cleaning additive to 7.6 ℓ of clean water and mix until fully dissolved. Do not mix cleaning additive with grout. Wipe grout joints and tile surface with a white nylon pad and plenty of water (with the cleaning additive) using a circular motion. Drag a damp clean sponge diagonally over the scrubbed surface to remove grout residue.

Final Cleaning: Use Final Wash Cleaning Additive

Wait at least 90 minutes after the initial wash at 21°C for the final wash using the same procedure as in the initial wash. Prepare another two gallons of clean water and add the Final Wash cleaning additive and mix until fully dissolved. In the final wash avoid contact with the grout – clean tile surface only.

Final Inspection

Inspect after 6 – 12 hours. If any haze remains on tile, scrub with warm soapy water. Use STONETECH[®] EPOXY GROUT HAZE & COATING STRIPPER if film/haze has cured and is difficult to remove.

6. AVAILABILITY AND COST

Availability

LATICRETE[®] materials are available worldwide. For distributor information, please contact LATICRETE Europe S.r.l. a socio unico:

+39 059 535540 info@laticreteeurope.com

For on-line distributor information, visit www.laticrete.eu.

Cost

Contact LATICRETE Europe S.r.l. a socio unico to obtain complete information and cost.

7. WARRANTY

The supplier warrants that the product will not deteriorate under normal conditions and use. The warranty validity of one (1) year. Contact Technical Services for further information. See 10. FILING SYSTEM:

• DS 230.13EU: 1 Year Product Warranty

8. MAINTENANCE

LATICRETE[®] and LATAPOXY[®] are products of high quality designed to achieve lasting installations and avoid maintenance, however performance and durability may depend on properly maintaining products, depending of the cleaning products used.

9. TECHNICAL SERVICES

Technical Assistance

Information is available by calling or emailing the Technical Service Hotline:

+39 059 535540 technicalservices@laticreteeurope.com

Technical and Safety Literature

To obtain technical and safety literature, please visit our website at <u>www.laticrete.eu</u>.

Warning

The information and the instructions in the data sheet, although based on knowledge gained through years of applications, are indicative. LATICRETE[®] is unable to directly control the installation methods and conditions of products and does not assume any liability arising from their implementation. Those who want to use LATICRETE[®] products should conduct adequate tests to determine the site specifications. Results shown are typical but reflect test procedures used. Actual field performance will depend on installation method and site conditions.

LATICRETE[®] products are covered by a warranty within the limits of what is established by our general conditions of sale and within the limits of correspondence related to technical specifications and applicable certifications, as expressly indicated in the product data sheets, documentation, or applicable technical documentation.

10. FILING SYSTEM

Additional product information is available on our website at <u>laticrete.eu</u>. The following is a list of related documents:

- DS230.13EU: 1 Year Product Warranty
- DS 0045EUR: SPECTRALOCK[®] 2000 IG How to Install
- DS 2370: 9235 WATERPROOFING MEMBRANE
- DS 6630: HYDRO BAN[®]
- DS 65318: STONETECH® EPOXY GROUT HAZE & COATING STRIPPER Product Data Sheet