

# RhinoShield IP<sup>™</sup> Data Sheet

#### PART NUMBER: RF400K-IP

DESCRIPTION: RhinoShield IP<sup>™</sup> is a flexible and durable polyurethane concrete deck coating system for use on intermediate parking structures and decks. RhinoShield IP<sup>™</sup> provides slip-resistance, durability and an excellent service life, as well as withstanding common parking structure problems.

TYPICAL USES: Concrete coating for the protection and aesthetics of high volume parking areas and decks.

### **FEATURES & BENEFITS:**

- · Chemical resistant protection against diesel, fuel, antifreeze, hydraulic fluid, chlorides and battery acid.
- Slip resistant textured anti-slip surface minimizes slip and skid risks.
- Noise reduction coating, minimizing tire squeal

#### **APPLICATION AREAS:**

• Bridge decks

Parking Garage

· Other horizontal concrete structures

CHARACTERISTIC	TEST METHOD	Result	
Flammability	EN 13501-1	B <sub>11</sub> - s1	
Chloride Ion Resistance	DOT BD47/94: Appendix B, Method B4,2(d)	No chloride ion penetration after 28 days	
Chemical Resistance	BS EN ISO 2812-1	Resistant to petrol, diesel, antifreeze, hydraulic fluids, battery acids.	
Slip/Skid Resistance	EN 13036-4	Class I: >40 units wet tested Class II: >40 units dry tested	
Adhesion	EN 1542	By pull-off test: ≥ 1.5 N/mm² (with or without trafficking)	
Impact Resistance	EN ISO 6272-1	Class II: ≥10 Nm	
Water Absorption	EN 1062-3	$w < 0.1 \text{ kg/m}^2 \text{ x h}^{0.5}$	
Abrasion Resistance	ASTM D 4070 CS 17 Wheel, 1000 Cycles	0.050g loss	
Compressive Strength	ASTM C579	10,600 psi	
Crack Bridging Ability	EN 1062-7 Method A, Table 6 Method B, Table 7	Class A5 -4°F (-20°C) Class 4.2 -4°F (-20°C)	

Estimated Cure Time	50°F (10°C)	68°F (20°C)	86°F (30°C)
Light Traffic	30 hrs	16 hrs	10 hrs
Full Traffic	36 hrs	24 hrs	16 hrs
Full Cure	12 days	7 days	5 days

<sup>\*</sup>Properties were tested at 68°F (20°C) and 50% Relative Humidity for a model specification.

APPLICATION METHODS: The installation should be carried out by a Rhino Flooring certified contractor. Obtain details of our licensed contractors by contacting a Rhino Flooring representative.

SURFACE PREPARATION: Concrete or screed substrate should be a minimum of 25 N/mm², free from dust and other contamination. Substrate should be dry to 75% RH as per BS8204.

## RHINOSHIELD IP<sup>™</sup> (continued):

Products In This System:

Primer - RhinoShield IP at 80 sq ft / gallon, mixed with SL filler at 720 sq ft / baq (optional)

Broadcast - To refusal with 20 - 40 or broadcast and backroll into top coat.

Top Coat Options - RhinoShield IP at 80 sq ft / gallon or RhinoShield UV at 80 sq ft per gallon

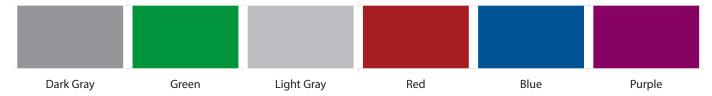
Note - thickness can be varied to suite traffic wear patterns.

MIXING INSTRUCTIONS: The mixing ratio for RhinoShield IP is 4 parts A (resin) to 1 part B (hardener). Mix thoroughly for 3 minutes using a drill motor and mixing paddle or for small quantities (1 ½ gal./ 5.7 liters) a stir stick can be used. Scrape the sides and bottom of the container while mixing. After mixing, allow a 3 minute induction period then mix again for approximately 15 seconds. Immediately pour the entire bucket in a thin row on the floor and begin spreading. If it sits in the bucket too long, it may set up prematurely. Mix only the amount of material that can be used in a 15 – 20 minute time period.

APPLICATION METHODS: Roller, squeegee, brush (small areas), "chopped" and "hand lay-up" method.

#### NOT RECOMMENDED FOR: Do not apply to concrete less than 28 days old.

COLOR OPTIONS: The color representations depicted in this brochure may vary from actual surface colors due to printing and ink variations and other environmental factors. Please contact an authorized Rhino Flooring<sup>™</sup> applicator for more information about colors.



No resin system is totally color fast and may change color over time (exhibiting a yellowing effect). Color change depends on the UV light and heat levels present and hence the rate of change cannot be predicted. This is more noticeable in very light colors but does not compromise the product's physical or chemical resistance characteristics. Rhino Flooring<sup>™</sup> makes every effort to minimize discoloration or fading.

### **IMPORTANT NOTES:**

- Please contact our Rhino Flooring<sup>™</sup> technical staff for details of specialist companies to supply line-marking, which can be recoated throughout the life of the RhinoShield<sup>™</sup> system.
- Aftercare, Cleaning and Maintenance; Clean regularly using a single or double headed rotary scrubber drier in conjunction with a mildly alkaline detergent.
- •The finished system is assessed as nonhazardous to health and the environment. The long service life and seamless surface reduce the need for repairs, maintenance and cleaning. Environmental and health considerations are controlled during manufacture and application of the products by Rhino Flooring<sup>™</sup> staff and fully trained application teams.
- Rhino Flooring<sup>™</sup> maintains a technical staff that will answer your questions and give you advice pertaining to your particular installation. Consult with product SDS for safety and handling prior to project start. Please keep a copy of SDS documents onsite.

PACKAGING: Packaged only in 3 gallon kits, 15 gallon kits and 55 gal. drums.

STORAGE: Protect against direct sunlight. At temperatures below 59°F (15°C) the paraffin dissolved in the binder may precipitate. The material must be stirred thoroughly before use.

SHELF LIFE: Unopened containers: at <77°F (25°C) minimum 12 months in original containers from date of delivery; at <86°F (30°C) minimum 6 months in original containers from date of delivery.

SAFETY PRECAUTIONS: Health Considerations: Consult the Rhino Linings\* Safety Data Sheets (SDS)

Chemical systems require the use of proper safety equipment and procedures. Please follow the Rhino Linings' product SDS and Safety Manual for detailed information and handling guidelines. For Your Protection: The information and recommendations in this publication are, to the best of our knowledge, reliable. Suggestions made concerning the products and their uses, applications, storage and handling are only the opinion of Rhino Linings Corporation. Users should conduct their own tests to determine the suitability of these products for their own particular purposes and of the storage and handling methods herein suggested. The toxicity and risk characteristics of products made by Rhino Linings Corporation will necessarily differ from the toxicity and risk characteristics developed when such products are used with other materials during a manufacturing process. The resulting risk characteristics should be determined and made known to ultimate end-users and processors. Because of numerous factors affecting results, Rhino Linings Corporation makes no warranty of any kind, express or implied, other than that the material conforms to its applicable current Standard Specifications. Rhino Linings Corporation hereby disclaims any and all other warranties, including but not limited to those of merchantability or fitness for a particular purpose. No statements made herein may be construed as a representation or warranty. The liability of Rhino Linings Corporation for any claims arising from or sounding in breach of warranty, negligence, strict liability, or otherwise shall be limited to the purchase price of the material.

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