# Cool Barrier Bicycle Lines Coat



### Cool Barrier Bicycle Line Coat

**Bicycle Line Coat** is one pack solvent based coating based on acrylic thermoplastic binders. It performs a high solar reflective flat surface with strong adhesion to asphalt and concrete surfaces. It is highly resistant to weather conditions and extreme temperatures. Where particularly anti-skid properties are obtained, the product can be mixed with white dry quartz sand also.

### **Principal Characteristics**

- Particularly resistant to ultraviolet radiation and to Ageing
- Particularly wear and mar resistant
- Fast drying
- Available in different colours
- Easy application
- Acquires reflective and antiskid properties easily
- Suitable for areas where high abrasion resistance and frequently use by traffic is critical
- Ideal solution for painting bicycle lines, playgrounds, sport yards and marking parking lots
- Can be mixed with white dry quartz sand
- Perfect performance in dry climate.
- Highly visible even in poor visibility conditions.

**Suitable Substrates:** Designed for painting long line and crossings, as well as plots in parking lots, concrete or asphalt floors, pathways, etc. It is suitable for every kind of new or old mineral substrate such as concrete or floor mortars.

Colours: White and Coloured

**Consumption Rates:** For an excellent performance 1, 5 m<sup>2</sup> per litter must be obtained.

Surface preparation and Primer systems: Surfaces must be clean, dry and free from all defective and poorly adhering materials, dirt, grease and salts. Before working with Cool Barrier ACS Coating system a thorough power wash with water of the surface with commercial power washer, between 2000-3500 psi is highly recommended. Recommended Primers: Cool Barrier ACS Primer

**General:** Do not apply, if rain or frost is expected in the next 24 hours. Clean immediately the painting equipment after the application. For more information, please consult our technical department for further instructions.

**Drying Time and recoatability:** Touch dry during summer season after 30 minutes and recoatable after 6 hours. Drying time depends on weather conditions and can be quite different in accordance to conditions of humidity or temperature.

Packaging: 20.0 litre cans.

**Storage:** 6 months under appropriate storage conditions

Application method & Thinning Rates: Roller, brush without thinning, airless spray gun up to 5% with ACS Solvent. Airless spray equipment is best suited for field applications, although rollers can be used as necessary if overspray is a concern. The following minimums are recommended for commercial applications:

Nozzle Orifice: 0.018 -0.021"

Pressure (atm.): 4-5

**VOC's Classification:** EU limits value for this product (Special one-component coatings (SB) (A/i) Phase I limit value: 600 gr/l Phase II limit value: 500 gr/l Maximum content of VOC of the product in a ready-to-use condition: 495 gr/l

**Safety and Health Information:** Caution Any work that includes application and use of this product shall be performed according to the applicable Safety, Health and Environmental regulations.

Read the safety precautions and the warnings specified in the Safety Data Sheet, and indicated on the product's label.

Keep away from fire and sparks. Provide adequate ventilation of the work space. Use appropriate protective means, as indicated in the Safety Data Sheet. Do not inhale fumes when spraying this product.

### Cool Barrier Bicycle Line Coat

**Bicycle Line Coat** is available in a number of standard colours with optimum solar reflectance properties. Cool Barrier Bicycle Line Coat in comparison to conventional coloured paint systems, performs unique properties in terms of:

### **Special Characteristics**

- Particularly resistant to ultraviolet radiation
- Excellent Light Fastness
- Lower surface temperatures
- Contributes to Urban Heat Island mitigation
- Improved thermal comfort
- Comply with LEED Credit 7.1: Heat Island Effect Non-Roof

### **Available Colours and Performance**

Bicycle Line Coat is available in a number of colours: Blue 21, Blue 42, Green 22, Brown 15, Yellow-Brown 20, Dark Yellow 10, Bright Yellow F. and White. Other colours can also be manufactured upon request.

## Surface Temperature reduction with the use of Cool Barrier Bicycle Line Coat (BLC) in comparison to new and aged asphalt pavements

### **Simulation Considerations:**

- a) For the calculation of the SRI the different solar reflectance values were used.
- b) For all samples the Infrared Emittance value was considered equal to  $0.88\,$
- c) Solar Reflectance values for Asphalt: New 0,07 Aged 0,15

asphait pavements						Aged 0,15				
Product	BLC Blue 21	BLC Blue 42	BLC Green 22	BLC Brown 15	BLC Yellow Brown 20	BLC Dark Yellow 10	BLC Bright Yellow F	BLC White	New Asphalt	Aged asphalt
SRI: Solar Reflectance index	32	40	40	42	50	71	78	107	1	15
TS: Surface Temperature	70,2 °C	67,2 °C	67,2 °C	66,7 °C	63,7 °C	55,4 °C	52,8 °C	42 °C	81,9 °C	78,1 °C
COLOURS										
Surface Temperature Reduction in Comparison to New Asphalt	- 11,7 ºC	- 14,7 °C	- 14,7 °C	- 15,2 °C	- 18,2 °C	- 26,5 °C	- 29,1 °C	- 39,9 ºC		
Surface Temperature Reduction in Comparison to Aged Asphalt	- 7,9°C	- 10,9°C	- 10,9 °C	- 11,4 °C	- 14,4 °C	- 22,7 °C	- 25,3 °C	- 36,1 °C		
Note: Calculation Tool coded By Ronnen Levinson Heat Island Group (http//heatisland.lbl.gov										