Polar Bear
Air & Moisture Barrier/Adhesive

PRODUCT DESCRIPTION

DuROCK Polar Bear is formulated with a 100% acrylic emulsion. It is a trowel-applied high performance coating formulated for use over wood substrates. It is an air/moisture barrier and adhesive for the DuROCK PUCC System. Polar Bear contains fibers that enhance the cohesive and tensile strength for added durability.

The low water absorption combined with a high flexural strength makes Polar Bear an ideal water penetration barrier for use on exterior wall systems; in particular plywood 12.7 mm (½ inch) thick and oriented strand board (OSB), minimum 11.1 mm (7/16 inch) thick. Check with DuROCK for use on other substrates.

As part of an air barrier system for a wall assembly, Polar Bear is compatible with most transition membranes comprised of bituminous SBS with fabric or cross-laminated polyethylene backing, as well as bituminous mastics and polyurethane foam sealants. Refer to DuROCK system specifications for product specific guidelines.

STORAGE & MIXING

Store Polar Bear above 4°C (40°F) and below 40°C (104°F), off the ground and in a dry place away from direct sunlight. Employ temporary protection measures as needed. Under no circumstances shall Polar Bear be permitted to freeze.

Using a stainless steel or corrosion resistant mixing blade and power drill, mix at 400 – 500 rpm, ensuring not to induce air into the product, until a uniform consistency is attained. Do not add water. Accelerators and other additives are prohibited and will void warranty. Discard material that becomes stiff or hard.

APPLICATION & COVERAGE

Substrate must be clean, dry, and free of cracks or loose material. Surface and ambient temperatures must be at least 4°C (40°F) a minimum of 24 hours, and must remain so until Polar Bear has dried. Do not apply Polar Bear in direct sunlight at temperatures exceeding 30°C (86°F) and protect from winds exceeding 25 km/hr (15 mph) as well as precipitation for at least 24 hours.

Sheathing joints shall not be greater than 6.4 mm (1/4 inch) wide. Sheathing board joints wider than 3.2 mm (1/8 inch) shall be pre-treated with fibre mesh tape. Refer to system specifications for installation requirements.

Coverage at the minimum required single coat thickness of 1.2 mm dry (1.5 mm wet) is approximately 15 sq m (160 sq ft) per 19 L (5 gallon US) pail. When used as both the first and second coat moisture barrier, and applied at the minimum required thickness, the coverage is approximately 7.5 sq m (80 sq ft) per pail. When used solely as the adhesive coat over Roller Bear, Polar Bear should be applied at a wet thickness of 2.0 mm, in which case the approximate coverage is 11 sq m (120 sq ft).

TECHNICAL DATA

Air Leakage Rate < 0.02 L/(s.m²) @ 75 Pa
Vapour Transmission Rate > 100 ng/(Pa.s.m²)
Water Transmission Rate < 2 x 10⁻⁷ kg/(m².s)
Adhesive Bond Strength > 0.3 MPa

Physical Characteristics:
- Non-Sagging
- Tack-free in 3 to 5 hours
- Pot Life – Approx. 1 hour
- Shelf Life – Approx. 3 years
- Cleans up with water

Refer to www.DuROCK.com for the most up-to-date version of this document.