







EXTERNAL USE GUIDE

Crafted Hardwoods' products are engineered for optimal performance in above-ground outdoor applications¹.

Whether our timbers are used for cladding, outdoor furniture, pergolas or exterior joinery, ensuring their durability and longevity in outdoor environments requires careful attention to three key factors:

- Adhesive suitability
- Species' durability & Preservative treatment
- Protective coating

These considerations work together to ensure that our timbers withstand the elements, remain strong, and look beautiful for years to come.

1. Adhesive suitability

Crafted Hardwoods' products are manufactured with the 3RT technology. For our products, 3RT uses a D4-grade adhesive as per EN 204.

D4 is the highest grade within this standard, indicating adhesives with strong waterproof properties, suitable for challenging environments.

Characteristics of D4-Grade Adhesives:

- Water Resistance: Suitable for interior applications with frequent long-term exposure to water (e.g., bathrooms, kitchens) and for exterior applications that are above ground and exposed to weather conditions.
- Durability: D4 adhesives are highly resistant to weather, moisture, and other harsh conditions, making them ideal for outdoor wood products or those that may experience prolonged moisture exposure.
- **Applications:** Typically used in applications requiring a strong, durable bond in challenging environments, such as outdoor furniture, cladding, or construction components.

The bond quality and durability of Crafted Hardwoods' products have been evaluated through accelerated exposure testing.

A delamination test designed specifically to assess the unique construction of Crafted Hardwoods' products has been developed by the Engineered Wood Products Association of Australasia (EWPAA), an organisation recognised throughout Australasia and valued for ensuring that wood products meet rigorous quality and durability standards.

¹ Please note that decking applications are currently undergoing weathering testing to ensure coating performance. As such, please contact us to discuss suitable species for decking applications.

2. Species' durability & H3 preservative treatment

Australian standard AS1604.1 outlines the requirements for wood preservation and helps to ensure that treated wood products in Australia are safe, durable, and appropriate for their intended use, protecting them against decay and insect attack while extending their lifespan.

Based on their durability class, the standard sets the requirements for species to be preservative-treated before being used in outdoors applications.

Crafted Hardwoods' Blackbutt and Spotted Gum, both Class 1, are suitable for outdoors above-ground use without preservative treatment due to their natural resistance to fungal decay and insect attack.

For species such as White Gum and Tasmanian Oak, H3 preservative treatment is required for any outdoor use.

Once H3-treated, Crafted Hardwoods' timbers can be used in applications where the wood is exposed to the elements but not in direct contact with the ground, with a 25-year protection guarantee against fungal decay and insect damage.

3. Protective Coating

To ensure the longevity and performance of Crafted Hardwoods' products, it is essential to apply a suitable coating² to all faces and ends of the timber.

Applying the product as per manufacturer instructions is key, as well as re-coating at recommended intervals to maintain optimal performance and extend the timber's life. Any cuts, drill holes, or exposed surfaces should be coated to maintain protection.

For outdoor applications, we recommend the following products:

- Intergrain Heavy Duty High Build Timber Finish (link: Intergrain Heavy Duty)

 A durable, water-based coating designed to protect exterior timber surfaces from harsh weather, UV rays, and general wear and tear. Known for its low odour and eco-friendly composition, this finish forms a tough, clear film over timber, providing both aesthetic appeal and long-lasting protection. It forms a resilient, clear layer over the wood, which helps prevent raised grain, splintering, and roughening.
- Bondall Monocel Gold Marine Grade Varnish (link: Monocel Gold Exterior) A high-performance clear varnish designed specifically for outdoor timber exposed to harsh weather and marine environments. Known for its durability and protective properties, this varnish provides a hard, glossy finish that shields timber against moisture, salt, and UV rays, making it especially suitable for boats, outdoor furniture, and exterior wood surfaces near coastal areas.

_

² Timber oils are not recommended for outdoor applications, as they do not adequately protect the surface from grain-raising or roughening.

By carefully considering adhesive, durability, and coating requirements, we can ensure that our timbers perform at their best in outdoor applications. With the right treatment and maintenance, our products provide lasting beauty and strength, making them the ideal choice for your next project.
provide tasting beauty and strength, making them the lacat enoise for your next project.