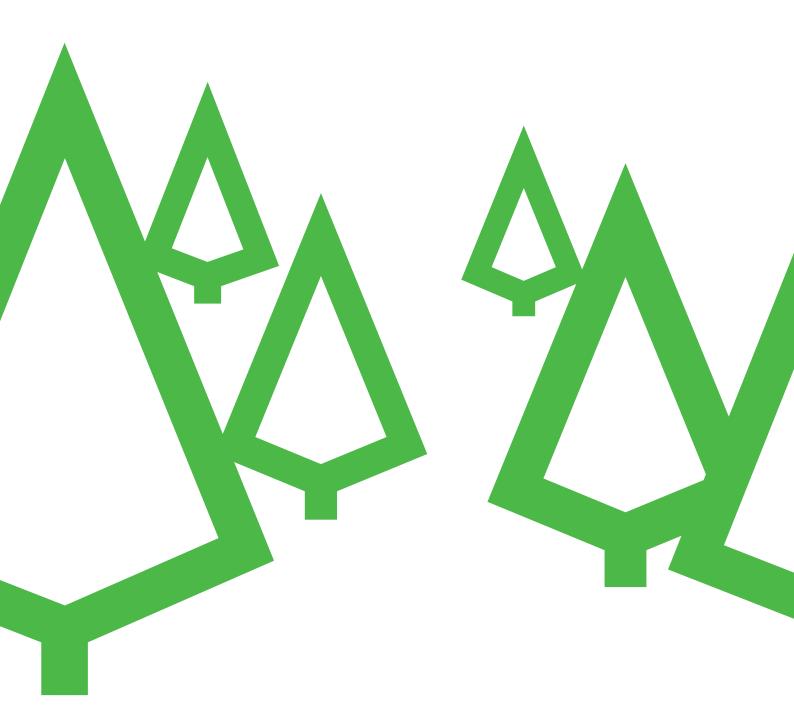


THERMOWOOD PLASTIC COMPOSITE (TWPC)



WWW.LUNAWOOD.COM

# LUNAWOOD THERMOWOOD PLASTIC COMPOSITE - LUNA TWPC

# In construction projects, you need to have confidence in the materials used.

Thanks to its unique structure, Lunawood Thermowood Plastic Composite is one of the most stable composite material on the market. It withstands changes in temperature better than any other composite material. What makes this material so robust is the high-quality thermowood fibre used in its manufacture: the product contains twice as much of this fibre as is found in a piece of solid wood of similar size.

The Lunawood composite is three times the density of pine, and it contains 65% thermowood fibre and 20% good-quality CIRCO® recycled polypropylene plastic. The product's high thermowood fibre content and low thermal expansion guarantee that it retains its shape and size for decades to come.

The thermowood-fibre raw material is a by-product of the company's thermowood production processes, making TWPC an eco-friendly product manufactured from local materials. As Lunawood TWPC contains no PVC or toxic chemicals and is made from 85% recycled material, it is environmentally friendly throughout its service life. Once construction is complete, any leftover material can be burned similarly to wood or disposed of with waste used for energy generation.

# TWPC Thermal expansion and contraction in length due to changes in temperature

#### mm expansion / contraction

	1 m board	2 m board	3 m board	4 m board
10 °C change	0,3 mm	0,6 mm	0,8 mm	1,1 mm
20°C change	0,6 mm	1,1 mm	1,7 mm	2,3 mm
30°C change	0,8 mm	1,7 mm	2,5 mm	3,4 mm
40°C change	1,1 mm	2,3 mm	3,4 mm	4,5 mm
50 °C change	1,4 mm	2,8 mm	4,2 mm	5,6 mm

#### **LUNA TWPC - AN IDEAL CHOICE**

- Length stability second to none (Installation guide www.lunawood.com)
- Resistance to wood decay the product contains no resins or other substances that could nourish wood-decaying fungi
- Environment-friendly composition, with 65% thermowood fibre and 20% CIRCO® recyclate
- Safety the product has no toxic chemicals, no splinters, and good friction
- Elegance and modern design, with a hidden fixing system that provides for easy, fast installation

#### LUNAWOOD

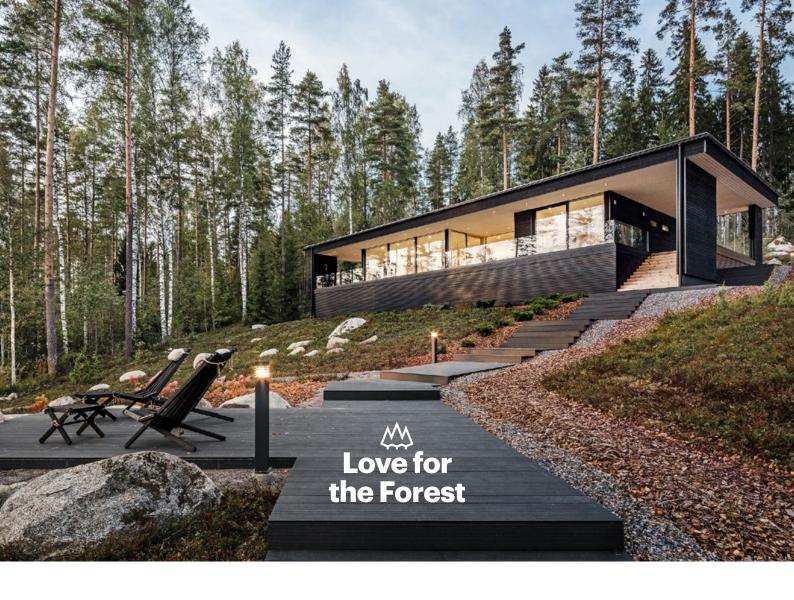
#### INFORMATION ON THERMOWOOD

Thermowood is produced by heating wood to high temperatures in a natural process that involves only heat and steam. Our patented heat-treatment process results in permanent changes in the fundamental properties of the timber, transforming it into an exceptionally stable and durable material.

## Fortum Circo®

#### **CIRCO® RECYCLATE AS RAW MATERIAL**

CIRCO® recyclate is a cost-effective industrial raw material for replacing virgin raw materials. By selecting recycled plastic as raw material, we can reduce our carbon footprint and environmental load. This new generation of renewed plastic is produced at Fortum's new and modern recycling plant that efficiently separates and cleans the materials supplied for recycling, while being friendly to the environment.



Exceptional stability for many years to come. Suitability for private properties and public buildings alike.



DIMENSIONAL STABILITY



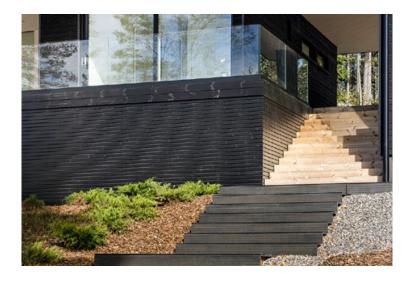
ALL CLIMATES



WEATHER ENDURANCE



NON TOXIC



## **LUNA TWPC 26×140 DECKING**

# **Finish choices**







Silver colour, grooved surface

Graphite colour, grooved surface

Mocca brown colour, grooved surface







Silver colour, brushed surface

Graphite colour, brushed surface

Mocca brown colour, brushed surface



#### LUNA TWPC 26×140 mm

Length	4 m / 6 m
Running metres	6,85 rm/m²
Package	84 boards/package
Weight	2,7 kg/m
Joist centres	400 mm (recommended)

Solid profiles and other lengths are available by special order.



#### **FAST CLIP - Hidden fixing system**

Number required	17 pcs/m² (joists set at 400 mm centres)
Package	250 pcs/package
Colour	brown, black or grey









#### **LUNA TWPC 26×140**

Accessories for giving a finishing touch to the decking.

#### Aluminium side strips for board edges

- · black, silver and brown
- length 4 m

For side finishing you can also use the black or grey aluminium L-strip of product Luna TWPC 42×200.

#### Gap strip

- · black, grey and brown
- 100 m / roll

# End-caps for the board ends • black, light grey and brown Aluminium corner guards (e.g to be used for steps) black, grey and brownlength 4 m Plugs for sealing corner guards



Further information and instructions > LUNAWOOD.COM



· black, grey and brown





### **LUNA TWPC 42×200 DECKING**

#### **Finish choices**







Silver colour, grooved surface

Graphite colour, grooved surface

Mocca brown colour, grooved surface







Silver colour, brushed surface

Graphite colour, brushed surface

Mocca brown colour, brushed surface



#### **LUNA TWPC 42×200 mm**

Length	4 m
Running metres	4,83 rm/m²
Package	40 boards/package
Weight	5,3 kg/m
Joist centres	600-800 mm

#### T

#### T-HIDE CLIP - Hidden fixing system

Number required	6-8 pcs/m² (joists set at 600-800 mm centres)
Package	50 pcs/package
Colour	black







#### **LUNA TWPC 42×200**

Aluminium L-strip is available to give the decking area a finishing touch.

#### Aluminium L-strip (26×42 mm)

- · black and silver
- length 4 m
- compatible also for Luna TWPC 26×140

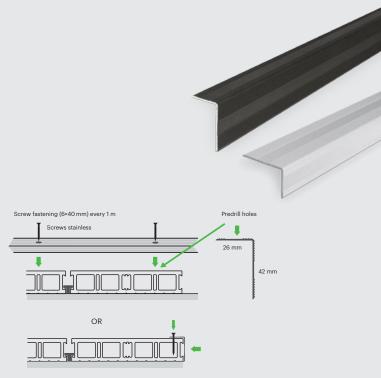
#### About L-strip fixing:

predrill 6 mm hole on L-strip and 4–5 mm hole on composite surface before fixing the strip. Composite can crack near the board edge. When using a powered screwdriver please ensure the screws are not over tightened, as this may damage the board.

Screws are included with the delivery.

We also recommend using outdoor adhesive for fixing the strip to ensure permanent and long lasting fixing. Follow the adhesive manufacturer's instructions.

Further information and instructions > LUNAWOOD.COM



## **LUNA TWPC APPLICATIONS**

Our thermowood plastic composite is well suited to a wide range of weather conditions and applications. The boards have one side with a brushed surface, while the other surface is grooved. Both sides can be used as decking surface.

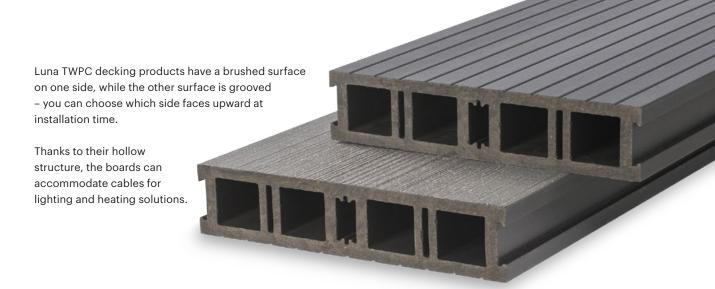
- Decking (for residential and public buildings)
- Spas and pools
- Sports facilities and multi-purpose buildings
- Balconies
- Jetties
- Stairs
- Fences, landscaping levels, and other garden applications











#### **MAINTENANCE INSTRUCTIONS**

Lunawood thermowood composite is easy to maintain and doesn't require surface treatment. The board surface and gaps between boards must be brushed regularly and should be washed (with water and a mild detergent) when necessary. As the product is not fully water-repellent, any stains e.g. food and grease smudges should be removed immediately, to prevent them from discolouring the wood. Similarly to solid wood, thermowood plastic composite is susceptible to scratching, so the feet of any furniture placed on it should be equipped with pads. Care needs to be taken also during construction in order to avoid surface abrasion.

# THE EFFECT OF UV RADIATION ON THERMOWOOD PLASTIC COMPOSITE

The colour of Luna TWPC decking products stops changing within 6–12 weeks of installation, with the final colour depending on the amount of UV radiation. Because of the nature of the thermowood fibre, the silver decking material in particular shows a slight brown hue when new, but the colour becomes grey after exposure to sunlight. The colours may differ slightly from those shown in the picture: a new product on the left, the product six weeks after installation on the right.

All colours are samples: after exposure to sunlight UV radiation after around 6 weeks of installation.



Silver colour, grooved surface



Graphite colour, grooved surface



Mocca brown colour, grooved surface



Silver colour, brushed surface



Graphite colour, brushed surface



Mocca brown colour, brushed surface





