



SMART[®] BOARD

COMPOSITE DECKING

INSTALLATION GUIDE DUO LITE



Freephone Helpline: 0800 8496339



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1.

WHY CHOOSE DUO LITE?



1. Easy Installation - No need for professional installers!

SmartBoard Duo Lite is designed for straightforward, hassle-free installation. With a simple DIY approach, you can have it installed ready to use in no time, saving you money.



2. Low Maintenance

SmartBoard Duo Lite requires minimal upkeep. A quick clean with water and soap once or twice a year is all it takes to maintain its pristine appearance.



3. Durability

Our SmartBoard Duo Lite composite material boasts exceptional strength and resilience. It resists rot, warping, and cracking.



4. Splinter and Stain Resistant

SmartBoard Duo Lite is engineered to be splinter-free, offering a comfortable and safe surface. Additionally, it's highly resistant to staining, ensuring that accidental spills won't affect its appearance.



5. Budget Friendly

SmartBoard Duo Lite offers outstanding value for money. It combines the best of quality and affordability, making it an ideal choice for those seeking a budget friendly composite decking option.

2.

KEY FACTS

- **Looks like decking: Is simple to fix!**
- **Style:** Hollow core
- **Smarter Look:** compared to other competitors, tactile wood grain finish.
- **Colour:** Ash Grey, Charcoal
(Like other composites the colour will lighten over first few months and then settle)
- **Decking Size:** 22 x 140 x 3600mm
- **Pack size:** 112pcs /pack
- **Fascia Size:** 12 x 140 x 3600
- **Reversible profile:** Two colour reversible wood grain effect
- **Environmental Certification:** 100% FSC
- **90% Recycled:** 60% Timber (Recycled Wood Waste), 30% Recycled high density polyethylene and 10% additives. Special additives minimise longitudinal expansion.
- **Fixing Clip System:** 1 decking clip per joist.
(10 per board at 400mm centres, 13 per board at 300mm centres)
- **Subframe:** Fit SmartBoard Duo Lite over double joist construction where boards are laid end to end. We recommend you use SmartFrame for the subframe.
- **Span:** 400mm joist centres domestic loading (300mm for commercial loading)
When laying SmartBoard Duo Lite in a diagonal 45 degree pattern the supporting joists must be brought in to 300mm centres.
- **Gaps:** 5mm between boards and ends of adjacent boards, 10mm gap against a permanent structure.
- **Weight:** 2.52kg/m
- **Warranty:** 25 years residential, 10 commercial/public
(Please visit our website for full details and instructions)

3.

BOARDS & T CLIP CALCULATOR

The table below gives you a rough guide to how many boards you need for a given area. In practice every deck is a different size and shape and this will need to be taken into account when planning the deck also allowing a percentage on top for waste.

If the deck is longer than 3.6m you will need to calculate where your end to end joints will be in order to incorporate these positions into your substructure design for double joisting.

It is important to follow the instructions and adopt good site practice when installing the deck. Make sure that the surface of the deck is kept clear, tidy and is protected during construction in order to avoid any damage or accidents.

	Coverage of Decking in Metre ²														
	1	2	3	4	5	6	7	8	9	10	20	30	40	50	60
Linear Metre	6.9	13.8	20.7	27.6	34.5	41.8	48.3	55.2	62.1	69	138	206.9	275.9	344.9	413.8
T Clips Required	18	36	54	72	90	108	126	144	162	180	351	522	693	864	1035
Boards Required	2	4	6	8	10	12	14	16	18	20	39	58	77	96	115

Boards and "T"Clip Calculator Table (400mm Centres)

4.

TREATED TIMBER

To ensure you get the best return from your investment for your deck, it is money well spent to make sure that the materials used for the substructure are suitably treated for the task they are being asked to perform.

Make sure that any timber exposed by cross-cutting, notching or boring after treatment must be adequately protected using an end grain preservative, in accordance with the manufacturer's instructions.

Preservatives such as Cuprinol's Wood Preserver by Akzo Nobel Ltd or Rustin's End grain Protector.



WOOD PRESERVATIVE



WOOD PRESERVATIVE WITH BUILT-IN COLOUR

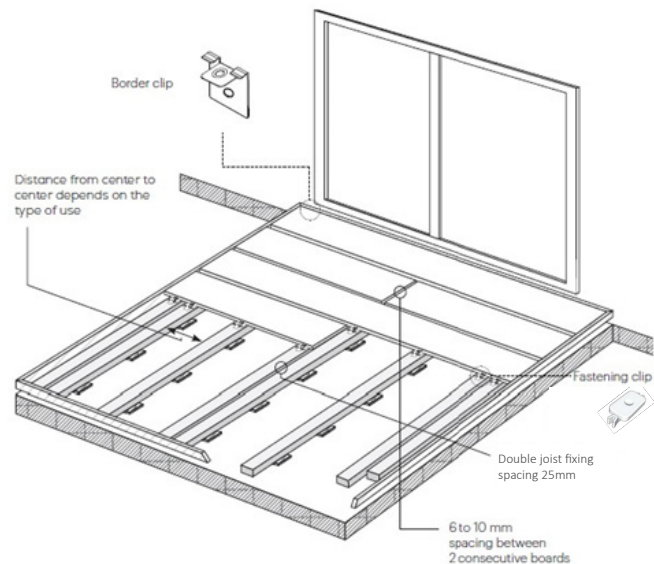
INTERIOR	EXTERIOR	
Use Class 2	Use Class 3(u)	Use Class 4
Above the ground or DPC, covered	Above the ground (uncoated)	Ground or fresh water contact (and exterior structural support)
Internal construction timbers within the building envelope: Tiling battens, framing and roof timbers, internal joists, sole plates.	External construction timbers: Deck boards, fence rails and boards, cladding (including battens) and fascias.	External construction timbers: Fencing, fence posts, agricultural timbers, retaining walls, playground equipment, decking posts, joists and sub-structures.

5.

ESSENTIAL INSTALLATION ADVICE

- Fit over joists placed at 400mm centres, when boards are perpendicular to joists.
- Fit over joists placed at 300mm centres, when boards are aligned at 45 degrees to joists.
- Maintain a 5mm gap between ends and sides of all adjacent boards.
- Maintain a 10mm gap between ends and sides of boards adjacent to a permanent structure/fixture.
- Fit SmartBoard over double joist construction where boards are laid end to end.
- Do not use any other type of screw or fixing to fit SmartBoard Duo Lite. The boards need to be allowed to properly stabilise prior to installation.
- It is recommended that the boards not be stored in bright sunlight, even temporarily. You should not proceed with the installation if temperature is below zero.
- Variations in temperature and humidity at the time of installation will lead to variations in the sizes of the boards, therefore sufficient gaps must be accounted for between the boards (sides and ends) at the edges of the deck, along the walls and near any fences, gates and trees, and around any equipment or structure included in the deck surface.
- We advice not to sink or enclosed the deck. If necessary, always allow airflow by using larger gaps and air vents.
- The structural timber joisting used for supporting Smartboard Duo Lite should be fit for purpose. We recommend our 4.8m Smartframe product (45f x 95f mm or 45f x 145f mm) as the most suitable. See website for details: stamco-hoppings.co.uk

Installation Diagram



6.

HANDLING & STORAGE

Recommendations for SmartBoard Duo Lite Stockists & Fitters:

- It is best to store SmartBoard Composite Fencing inside/undercover in shade, and protected from weather until ready to install.
- Pick orders from the specially designed pallet provided.
- If boards are to be stored in A-Frame racking then at least 1 mid-term support is required otherwise boards may deform slightly, not an issue but might be perceived as so when received on site.
- Re make orders using sheet polystyrene, as used to separate SmartBoard Duo Lite in its pack form as shown. This will help minimise marking and help restrict boards from sliding in transit.
- When ratchet banding up a set of boards, always protect the corners of the 4 exposed edges to avoid crushing.
- Placing, rather than sliding boards on top of one another is preferable when moving boards about on site as sliding boards over one another may cause marking.
- On site, ensure boards are stored flat, off the ground and with sufficient support (every 600mm).

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RECOMMENDED TOOLS

- Safety Glasses/ Relevant PPE
- Tape Measure
- Pencil
- Spirit Level
- Power Drill
- Set Square
- Hand Saw or Mitre Saw
- Jigsaw
- Appropriate blades for cutting composite material



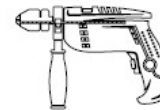
Safety Glasses



Circular Saw



Tape measure



Power Drill



Rubber Mallet



Spirit Level



Safety Gloves

DECKING & ACCESSORIES

- Joists
- Screws
- Deck Boards
- Fascia Boards
- Start/ Finish Clips
- Decking "T" Clips
- Decking Grip Clips



8.1

PRE-INSTALLATION ADVICE

Please refer to our PDF information guides on planning a deck, getting started and building a deck, all available on our website: stamco-hoppings.co.uk



Read all of this manual before you begin laying the boards!

Following the installation and maintenance instructions below will determine the longevity and warranty of your product. This notice provides general installation cases.

INSTALLATION OF SUBSTRUCTURE

- The structural timber joisting used for supporting Smartboard decking should be fit for purpose. We would recommend our Smartframe product as the most suitable. See our website for more information: stamco-hoppings.co.uk
- We advice not to sink or enclosed the deck. If necessary, always allow airflow by using larger gaps and air vents.
- Take into account the direction you want the boards to lay when planning a substructure, we would normally recommend them being perpendicular to the joists at a maximum of 400mm centres. Plan where your deck boards are going to run end to end to allow for double joisting.
- For a free draining deck surface, you must incorporate a gradient in one direction for your deck.
- Joists should be fixed to a secure post which is suitably treated timber (UC4) or a concreted post secured into a concreted foundation.
- If the deck is going onto solid foundations or a flat roof capable of supporting a deck then the substructure may well be supported using adjustable support pedestals.(SmartBase)
- A gap of 10mm needs to be left between the substructure and adjacent permanent structures.

8.2

PRE-INSTALLATION ADVICE

BEFORE FIXING THE DECK BOARDS TO THE JOISTS

- Before installing the deck, make certain that all the boards have a uniform colour. Slight differences in colour and appearance in the boards may occur, mix the boards over the deck to distribute the nuances over the entire area and lay them out in such a way that areas with different nuances are not laid out next to each other.
- Do not cut the boards across the thickness or the width. They can only be cut lengthwise.
- Avoid bevel cutting angles less than 45°.
- Maintain a 5mm gap between adjacent boards & between ends of the boards & fascias; increase to 10mm between the ends & for hot, humid, poor ventilated areas and where board butt up against a permanent structure.
- The deck boards must be fitted over at least 3 joists. They must not overhang the joists by more than 30mm whether it is at the border of the deck or at the junction where 2 boards meet.
- Make sure that when laying the deck boards on the substructure that the boards are cut to the correct length so when you come to fix the fascia board to the side of the substructure you have a 5mm gap between the end of the board and the fascia.

9.1

INSTALLATION GUIDE

FIXING THE DECK BOARDS TO THE JOISTS

1. Once you have determined the location and orientation of the first deck board, you are ready to install the first starter clip. Align the clip to the end and centre of the joist, screw the starter clip in place using the starter clip screw provided.

Using a straight edge or string line to ensure they are all aligned, install the remaining starter clips to each joist. Slide the groove of the first board into the starter clips making sure the board is fully installed before proceeding

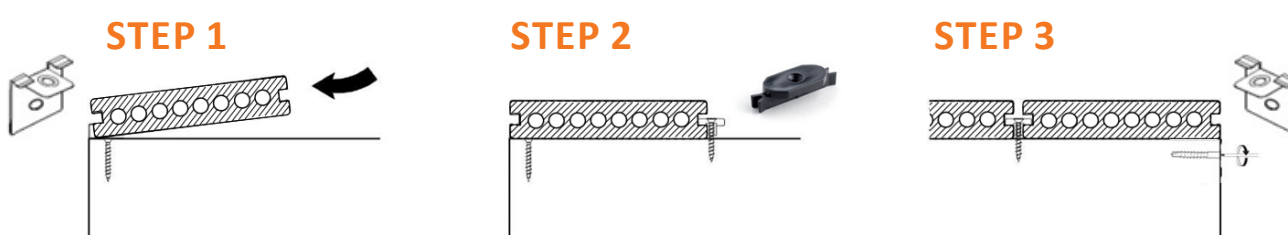
2. Take the decking Transition “T” clip and slide it into the groove at one end of the board and part screw through the "T" clip into the joist. By not screwing it fully into place it will allow the next board to slide more easily into place.

Install the rest of the “T” clips in this row part way in each joist as before making sure that the joist nearest the centre of the board has a metal grip clip instead, this has the job (when fully tightened down later in the instructions) of fixing that midpoint of the board to allow any expansion to occur evenly in both directions.

Take the next board and slide it carefully but firmly into the decking clips. Install the next row of clips to partially secure this board. Once that is done you can go back to the 1st row of decking clips and fully secure them down, taking care to use a screwdriver bit that will get between the boards without damaging them.

Repeat this process across the deck until you come to the last row of boards.

3. When the last board is in position you can take a starter/ finishing clip insert it into the groove at each joist and screw it securely to the face of the subframe.



9.2

INSTALLATION GUIDE

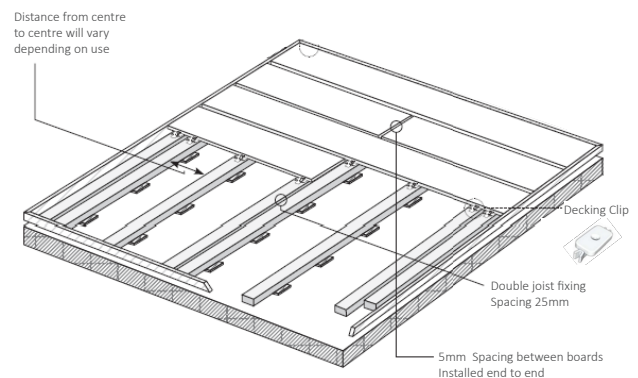
FIXING THE DECK BOARDS END TO END

Where a decking board is to be laid end-to-end with another board, a 5mm gap is to be left between the boards (Gap depends on temperature at time of installation).

Please note - As a product that contains both timber and plastic, composite decking is subject to movement with temperature change. The movement is 1mm per 10° C in temperature change of the product, not air temperature. In direct sunlight, darker composites will reach higher temperatures than lighter colours.

Please take into consideration the boards temperature when laying. If the weather conditions are particularly warm these may need tighter gaps during installation.

The boards should be supported by two sub-frame joists, positioned 25mm apart as shown on the image below. This allows the ends of the decking boards to be supported, whilst also allowing water to drain freely between the ends of the boards and prevent standing water.



IT IS IMPORTANT TO FOLLOW THE INSTRUCTIONS AND ADOPT GOOD SITE PRACTICE WHEN INSTALLING THE DECK.

Make sure that the surface of the deck is protected during construction in order to avoid any damage. To ensure you get the best return from your investment for your deck, it is money well spent to make sure that the materials used for the substructure are suitably treated for the task they are being asked to do. See our website for SmartFrame at stamco-hoppings.co.uk

Make sure that any timber exposed by cross-cutting, notching or boring after treatment must be adequately protected using an end grain preservative, in accordance with the manufacturers instructions. Preservatives such as Cuprinol Wood Preserver by Akzol Nobel Ltd or Rustin's End grain Protector.

9.3

INSTALLATION GUIDE

FIXING THE FASCIA

Once the main deck area is completed the 12 x 140mm fascia trims need to be installed to finish the look of your decking area by hiding the exposed edge of the boards and the face of the timber substructure.

TIP: The fascia is reversible and has one face and one edge to match the reversible decking colour options.

- Position the first fascia trim so that it is level with the top surface of the deck board and fix into the side of the timber substructure using the black fascia screws, 2 screws per board every 400mm.
- Screw holes should be pre-drilled, the hole needs to be 1mm oversized to allow horizontal movement of the fascia to take place. Allow a 5mm gap between boards and when fixing end to end.
- Use the fascia boards to finish off around the sides of the deck as required.

CLEAN IMMEDIATELY AFTER INSTALLATION

SmartBoard Duo-Lite is a low maintenance product, and it is important to clean it immediately after installation followed by a regular periodical cleaning.

Clean the entire surface thoroughly using a rigid non-metallic brush and water to eliminate any dust or construction residue. During this period, humidity stains and hallos may appear on the boards. These stains are normal and they will fade away with the weather as long as they are properly exposed to UVs and rain.

After the transition period the boards colour will be close to the original colour and will stay that way. Although these humidity stains and hallos vanish naturally with the weather, it is still possible to eliminate them by cleaning the surface once or several times along the length of the boards with the appropriate product.

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MAINTENANCE & CLEANING

REGULAR MAINTENANCE

Sweeping - Regularly sweep in order to prevent moss, algae or mould from developing on the surface. A thorough cleaning twice a year is recommended using a broom with non-metallic rigid brush to clean the surface.

Cleaners - To prevent grime, hydrocarbons, grease and water stains on composite timber, use an appropriate cleaner, such as Starbrite Concentrate Cleaner for Composite Timber (Ref. 1432), or a similar product based on surface-active agents.

High pressure cleaning - Max. 100 bar, using a mild detergent, is authorised. Hold the water jet at least 30cm away and at a 45° angle and clean across the surface. Avoid circular jet movements.

After every cleaning, immediately drain all the rinsing water from the surface using a squeegee.



Smartboard Light mainly contains natural components thus variations in colour or texture are likely to appear over time.

The variations in the shades mainly occur during the first 6 months following the installation after which the colour tends to stabilise, with a natural shade noticeably lighter due to the water that was absorbed by the timber fibres and the effect of the UVs.



Like any outside decking, the composite deck boards are likely to be scratched over time, which becomes part of the product's normal patina.

We would recommend that furniture placed on the deck be fitted with protective pads to prevent scratching.



Do not let stains get infiltrated and embedded into the rough patches of the surface.

It is preferable to eliminate them as soon as possible. Use water, a mild cleaning detergent, a non-metallic brush and a sponge.



SMART BOARD™

GREASE AND OIL STAIN REMOVER

TREATS GREASE AND STUBBORN OILY STAINS ON COMPOSITE AND TIMBER DECKING. JUST SPRAY ON AND BRUSH OFF!



INSTRUCTIONS:

1. Shake well before use.
2. Holding can upright, spray directly onto the product at a distance of about 10-25 cm so stain is completely covered. Apply liberally.
3. Allow to work for at least 10 minutes until the product is completely dry then brush or wash off with luke warm soapy water.
4. If necessary repeat the operation on tougher stains.
 - Store only in the original container in a dry, cool and well ventilated place away from direct sunlight.

IMPORTANT: Always test on hidden or inconspicuous area of deck first to ensure colour is not adversely effected. Over exposure may result in a slight discolouration or lightening of timber.

Complete stain removal cannot be guaranteed. The sooner stain remover is used on fat stained decking the greater the chance of removal. Fat stains may become more difficult to remove the longer they are left untreated and deeper they penetrate any absorbent material.

DANGER WARNINGS:

- Repeated exposure may cause skin dryness or cracking. Extremely flammable aerosol. Pressurised container, may burst if heated. Causes serious eye irritation. May cause drowsiness or dizziness. Toxic to aquatic life with long lasting effects. Keep out of reach of children. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Do not spray on an open flame or other ignition source. Do not pierce or burn, even after use.
- Wear protective gloves/protective clothing/eye protection/face protection.
- Protect from sunlight.
- Do not expose to temperatures exceeding 50°C/122°F.
- CONTAINS: Acetone; Propan-2-ol; Cyclohexane.



200ml e 270 3

5.

TECHNICAL DATA SHEET

SmartBoard Duo Composite Decking

PRODUCT DETAILS	Article Number	ND22221403600
	EAN Code	N/A
	Composition	54% Natural Wood Powder, 46% HDPE & Additives
	Profile	Dual side, 2 faces wood grain
	Fixing	On wood keels, fix with screws
	Colours	Charcoal, Dark Grey
	Section / (mm) (t*w)	22 x 140
	Length (mm)	3600
	Linear mass (Kg/m)	3.03

TECHNICAL PROPERTIES		
Flexural properties	Density	1.29 Kg/m ³
	Bending strength	30.60 Mpa
	Modulus of elasticity	3.20 Gpa
	Maximum load mean	4622 N
	Minimum load min.	4417 N
Determination of moisture resistance under cyclic test conditions	Original MOR	27.5 Mpa
	After exposure	Mean MOR: 26 Mpa
		Mean Decrease: 5%
		Min. MOR: 23.8 Mpa Max. Decrease: 13%
Coefficient of linear thermal expansion	Mean value Longitudinal	42.4 x 10 ⁻⁶ K ⁻¹
	Mean value Horizontal	42.4 x 10 ⁻⁶ K ⁻¹
Boiling	EN15534-1 - Section 8.3.3 and 8.3.1	Mean: 1.17%, Max.: 1.21%
Swelling after boiling (28 days immersion)	Mean swelling	0.38% in thickness
		0.19% in width 0.03% in length
	Max swelling	0.45% in thickness
		0.25% in width 0.06% in length
Fire behaviour	EN 15534-4, Cfl-S2	

LOGISTICAL INFORMATION	On pallet L= 3600 mm	Quantity	Working (m ²)	Net weight (Kg)
	Composite board 140 mm	112 pcs	56,44 m ²	1242 Kg

DETAILS DESCRIPTION	Our SmartBoard Light Decking, a B2B-friendly solution that combines easy installation, low maintenance, incredible durability, splinter and stain resistance, all while remaining budget-friendly, redefining outdoor design for commercial and private use.
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COLOUR CHANGE	Capped composite materials can experience colour variation over time due to factors like UV exposure, weathering, staining, and maintenance practices, which can result in fading, discolouration, and surface changes.
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NORMS	Technical Characteristics	Norm
	• Density	ISO 1183-1
	• Flexural properties (Bending Strength) • Flexural properties (Modulus of elasticity) • Flexural properties (Maximum load (mean and min.)) • Flexural properties (Deflection at 500 N (mean and max.))	EN 15534-1:2014
	• Moisture resistance under cyclic test conditions (Original MOR and After Exposure)	EN15534-1:2014, Section 8.3.2 - EN 321:2002
	• Coefficient of linear thermal expansion	EN15534-1:2014 - Section 9.2 EN15534-4:2014 - Section 4.5.6
	• Boiling	EN15534-1:2014 - Section 8.3.3 and 8.3.1
	• Fire behaviour	EN 15534-4, Cfl-S2

CERTIFICATES


6.



WARRANTY

25 Year (Residential), 10 Year (Commercial) Warranty

Stamco Hoppings hereby certify that when fixed appropriately in accordance with the relevant design guidance SmartBoard shall be deemed under warranty for a period of twenty-five (25) years (residential use) and ten (10) years (commercial/public use) from the date of original purchase. SmartBoard products shall not split, splinter or suffer structural damage as a sole and direct consequence of termites, insects or soft rotting micro-fungi.

LIMITATIONS

For a period of ten (10) years from the date of original purchase, SmartBoard products shall not break. However this warranty explicitly excludes occurrences where the break occurs or may have occurred as a consequence of impact loads or poor design/construction methods.

This warranty applies to the use of products in normal residential use. Contact Stamco Hoppings Quality Timber Products on 01992 578877 or 01424 856856 if you require a warranty for a deck that is to be created in a commercial type situation.

WHAT'S NOT COVERED

This warranty does not provide protection against misuse, abuse, neglect or improper storage or handling. Stamco Hoppings cannot be held responsible for product failure due to improper installation or failure to abide by Stamco Hoppings fitting instructions. It also excludes the discolouration/staining of the products due to:

- Air borne pollutants, such as mould, algae, leaf litter and any deposits from plants and trees.
- Any other foreign substances.
- Variations in colour, texture or appearance from one board to another.
- Changes in colour associated with weathering effect of ultra violet light.

UNDERTAKING

The warranty is for the cost of re-supply, by Stamco Hoppings, of a component that is proven to have failed as a result of fungal decay or insect/termite attack, FREE OF CHARGE. It does not cover the costs of removal or reinstatement of such components or consequential costs or loss due to failure of the component. The term 'fungal decay' as used in the warranty refers to wood destroying fungi that feed on and degenerate the wood cell walls. It excludes staining and mould fungi associated with the weathering of wood. The term 'failed' refers to damage caused by fungi, insects or termites to such an extent that the component is no longer fit for purpose. In the event of a valid claim being resolved via the supply of a replacement board(s) the colour may be a slightly different.

STATUTORY RIGHTS

This warranty is in addition to the purchaser's normal statutory rights. The warranties are wholesaler/manufacturer to consumer/buyer warranties. However the initial raising of a complaint should be directed to the authorised retailer from where the goods were purchased. The complaint should be made in writing/e-mail and must include proof of purchase i.e. a copy or scan of the original invoice.

The term 'fungal decay' as used in the warranty refers to wood destroying fungi that feed on and degenerate the wood cell walls. It excludes staining and mould fungi associated with the weathering of wood. The term 'failed' refers to damage caused by fungi, insects or termites to such an extent that the component is no longer fit for purpose. In the event of a valid claim being resolved via the supply of a replacement board(s) the colour may be a slightly different.



Freephone helpline:

0800 849 6339

If you need help with installation or have any questions about SmartBoard products, simply call our friendly team.

