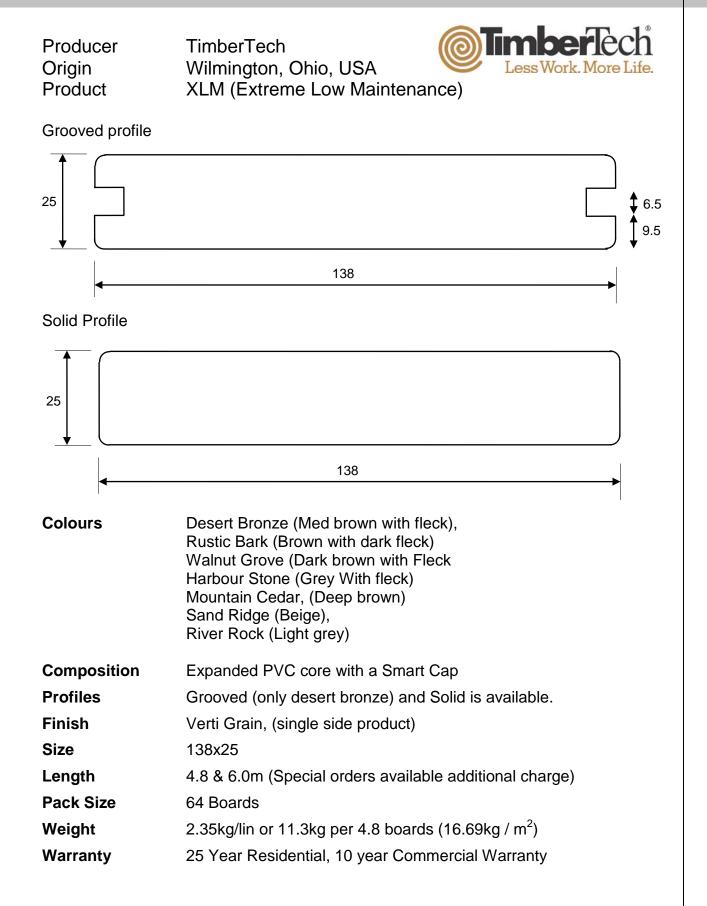
XLM Decking Tech Sheet



Installation

Span	Residential: 450mm joist centres (4KPa) Commercial: 400mm joist centres (4KPa)	
Per Square metre	7.14 lineal 1.48 Boards	
Spacing	End to End spacing guidelines for various temperatures End: 2mm: <25°C, 3mm: 1-24°C, 4mm: >0°C Side: 3mm	

Fastening Grooved Planks

Use TimberTech CONCEALoc Hidden Fasteners. Follow the directions in the CONCEALoc box, clips are painted brown.

- Softwood Joist: Use Standard installation procedure for CONCEALoc.
- Hardwood Joist: Pre drilling of the screws may be required to prevent screw shear.
- Steel Joist: A 30mm thick timber batten is required to be attached to the top of the steel joist for the CONCEALoc to fix into as the screws must enter on a 45° angle.

Fastening Solid Planks

Fasteners should be installed perpendicular to the deck surface and driven flush; DO NOT overdrive or splitting/stretching may occur.

- Fasten 19mm from outside edge and end of each plank, using two screws per joist including end joists.
- Screws are required to be pre drilled and counter sunk.
- Use a minimum #8 x 60mm flat or bugle headed stainless steel screws (or screws compliant with Australian Standards), driven flush with deck surface.
- Steel Joist Pilot holes for screws through the plank are to be 1mm bigger than the screw thread, winged-tek screws are not recommended.
- DO NOT nail XLM planks.
- Boundary boards on edge are required to be fixed every 600mm.

Clearances: Ventilation is important therefore a cavity is required between the underside of the XLM deck and the surface below.

- Concrete or similar 50mm clearance
- Dirt or similar 150mm clearance

Cantilevering: TimberTech XLM can be cantilevered a maximum of 25mm.

Glue: **DO NOT** use glue or caulk to fasten XLM planks or to seal the joint between two planks and any other surface. This will inhibit the natural expansion and contraction of the planks and will impede the drainage of the deck.

Fire Rating

Bushfire Attack Level 29 and below as per AS1530.8 testing to AS3959:2009 - testing completed by Exova Warrington Fire (Melbourne) 2009

Slip Resistance classification for new pedestrian surfaces

TimberTech XLM

Test	Result	Class
Wet Pendulum (across board)*	Mean BPN: 48	W
Wet Pendulum (along board)*	Mean BPN: 44	Х
Oil Wet Ramp (across Board)*	Acceptance angle: 26.9°	R11
Oil Wet Ramp (along Board)*	Acceptance angle: 20.6°	R11
Wet Barefoot Ramp^	Mean Angle: 19°	В

*CSIRO Test results June 2008 ^CSIRO testing December 2010

Oiled timber

Test	Result	Class
Wet Pendulum (along board)	Mean BPN: 26	Y
Oil Wet Ramp	Acceptance angle: 11°	R10

CLASSIFICATION GUIDE FOR PUBLIC WET BAREFOOT AREAS Handbook 197 TABLE 4

Class.	Min. Angle	Areas of application
A	12°	- barefoot passages (mostly dry)
		- individual and communal changing and locker rooms
		- swimming pool floors in non-swimmer areas, if the water depth in the entire area (of a pool) is more than 80cm
В	18°	- barefoot passages not classified in group A
		- shower rooms
		- pool surrounds
		- in the vicinity of disinfecting spray facilities
		 swimming pool floors in the non-swimmer areas, where the water depth is less than 80cm
		- non swimmer sections of wave-action pools
		- lifting platforms
		- toddler's paddling pools
		- ladders leading into water
		 stairs leading into the water with a maximum width of 1m and handrails on both sides
		- ladders and stairs outside the pool area
		 seating and resting steps and benches
С	24°	- stairs leading into the water, if not classified in Group B
		- walk-through wading pools
		- sloping pool edges

Weather

Colour stability

- Fade resistant
- Reflective inorganic colour pigments
- Minimise heat build up

Surface Temp (Partly Cloudy at 28.3°C)

• • •	
Desert Bronze	64.4 °C
Rustic Bark	73.9 °C
Mountain Cedar	67.2°C
Sand Ridge	65.5 °C
River Rock	68.3°C
Treated Pine	58.3°C

Note: Any surface temp over 46°C will become uncomfortable in bare feet

Snow Zones

- XLM installed at 450mm joist centres can carry up to a 8KPa snow load
- Testing completed to minus 28°C

Physical Properties

Property		Result
Thermal expansion	Coefficient for width	5.4x10 ⁻⁵ mm/mm/ ^o C
Thermal expansion	Coefficient for length	4.86x10 ⁻⁵ mm/mm/°C
Stiffness	MOE (3% strain)	1586 MPa
Bending	MOR (3% strain)	30.1 MPa
Flexural stiffness (3%		296767 KN.mm ²
strain)		
Moment capacity (3%		448662 N⋅m
strain)		
Shore hardness		D60
Wind up lift - CONCEALoc		1.36MPa
Fastener pull through		1392 N
Water absorption		<0.8% mass

Benefits of TimberTech Decking

Background

TimberTech were early market entrant in the USA, many years of R&D pioneering composite decking prior to 1997

Crane plastics has over 60 years experience in plastic extrusion and building materials development

TimberTech is an international world leader in innovation, technology and development.

TimberTech Advantage for XLM

- o Quality
 - Quality is their passion
 - Highest quality materials
 - Product consistency
 - Finish Vertigrain
- o Innovation
 - Expanded polymer core with smart cap
 - Co extrusion technology
- o Durability
 - Termite resistant
 - Scratch and fade resistant
 - Strength and durability
 - Water absorption
 - Bushfire Resisting for BAL29 (AS1530.1)

Timbertech colour quality

- Consistent colour from board to board, colour blended inline not by batch
- o Maintains colour better high concentration of UV inhibitors
- Remain comfortable reflective inorganic pigments reduce heat build up

Finest Quality ingredients

- Pure Poly Vinyl Chloride
- o Stability Package
- o Reflective inorganic colour pigments

Quality materials in yield quality product out