

Before You Begin

Please note that Lumberock® Marine Grade Decking claims no responsibility for the improper installation of our product. We recommend that a licensed architect, engineer, or local building official review all designs before installation.

Knowing how to work with Lumberock® Marine Grade Decking is the key to performance, longevity, and success. As with most synthetic deck boards, Lumberock® Marine Grade Decking will expand or contract depending on temperature. It's important to note that the acclimation of the board is critical before cutting or fastening.

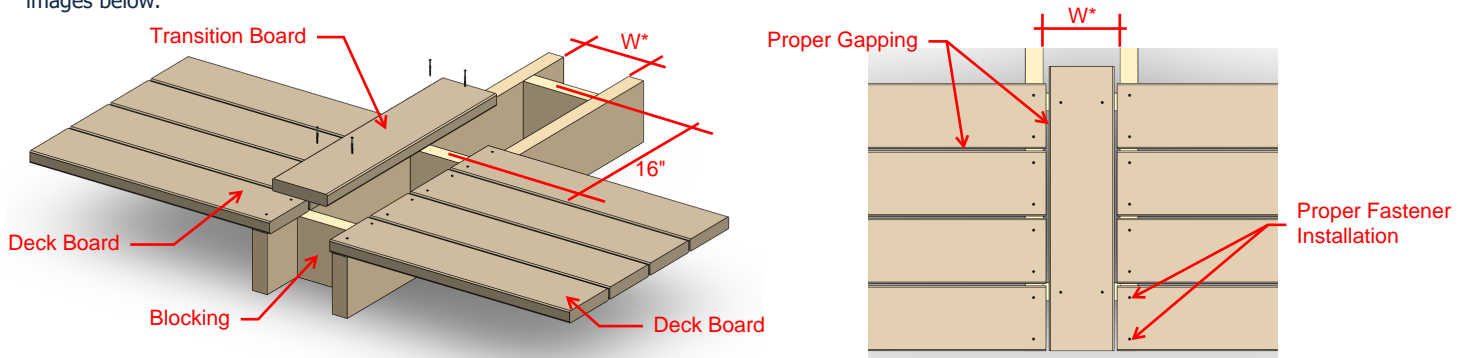
By taking the time to do the installation correctly, you will be creating a deck or dock that will look great with very little maintenance required.

Handling & Storage

- ▶ Always keep Lumberock® Deck Boards covered and clean before installation.
- ▶ Lay boards flat.
- ▶ Be sure to lift each board individually versus sliding across the bottom boards. This will prevent hidden debris from damaging the boards.

Deck Design and Layout

To eliminate noticeable gapping, we encourage using a transition board or a "picture frame" design instead of butt joints (end to end). In the utilization of a transition board, blocking should be placed every 16" between joists to properly support the transition board as depicted in the images below.



*Blocking should be long enough to allow for proper gapping, water drainage, and fastener installation as described in the following sections.

As a rule of thumb, shorter boards (16 feet or less) experience less movement than longer lengths and should be incorporated into the deck design and layout whenever possible.

Framing and Joist Spacing Requirements

The frame of a deck is its primary support structure, consisting of posts, beams, and joists. Follow these deck framing guidelines before installing Lumberock® Marine Grade Decking. All joists must be level and structurally sound for new and existing deck frames.

For 5/4" x 6" board residential construction - joists should be spaced 16" maximum, perpendicular (i.e. 90°) to the decking boards. For diagonal (i.e. 45°) joist configurations or commercial construction - joists should be spaced 12" maximum.

For 2" x 6" board residential construction - joists should be spaced 24" maximum, perpendicular (i.e. 90°) to the decking boards. For diagonal (i.e. 45°) joist configurations or commercial construction - joists should be spaced 16" maximum.

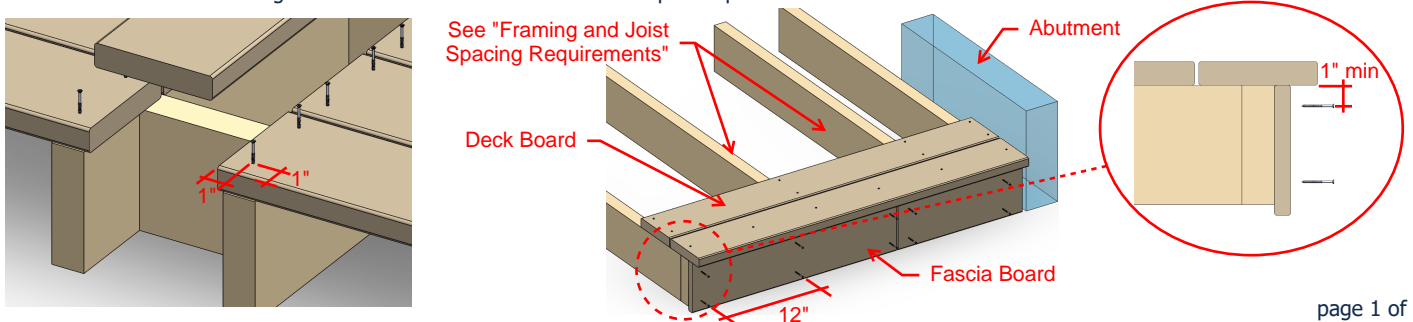
Fastening Options and Installation

Lumberock® Marine Grade Decking can be installed using a hidden fastening system or face screw. Refer to the hidden fastener screw manufacturer for proper deck installation requirements.

For deck board screw installation - we recommend 2 1/2" long screws for 5/4 x boards and 3" long screws for 2 x boards. Two screws are needed at joist points and should be installed 1" from all board edges. #8 or #10 stainless steel flat head deck screws are recommended. One #7 or #8 stainless steel flat head deck screw is recommended for tongue and groove profiles. Pre-drilling is not necessary but is recommended.

For 1 x fascia board installation - we recommend two 2 1/4" long screws installed at least 1" from all board edges spaced every 12" along the length of the board. For boards wider than 8", three screws should be used. #8 or #10 stainless steel flat head deck screws are recommended. Pre-drilling a hole slightly larger than the diameter of the screw is recommended to allow for lateral movement.

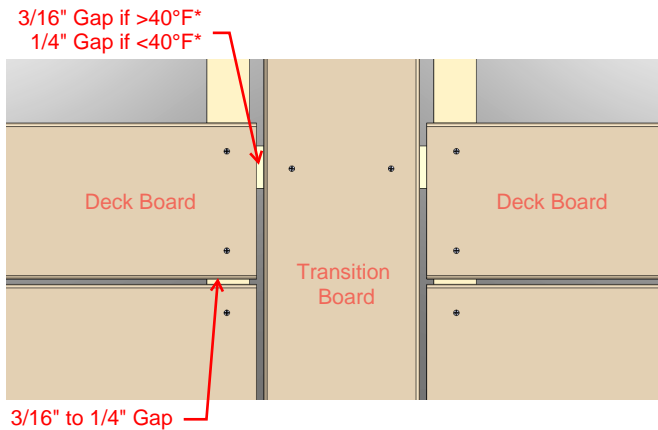
Lumberock® Marine Grade Decking boards should be installed with the wood grain pattern facing up to enhance the look and improve the slip resistance of the board. Decking and color-match screws are available upon request.



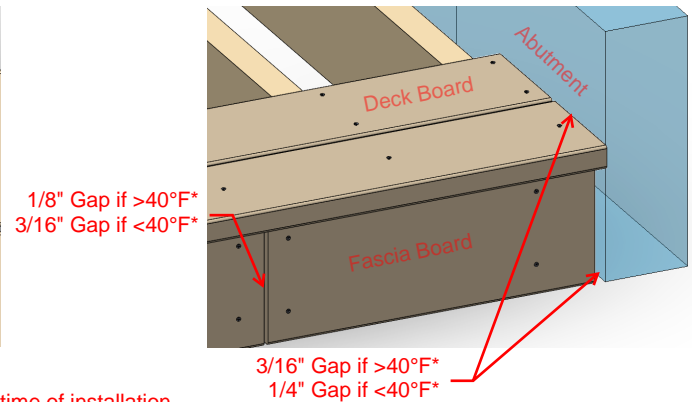
Gapping and Thermal Expansion & Contraction

Lumberock® Marine Grade Decking boards should be gapped end to house, end to trim, or end to transition/feature board based on their location within your project. Proper gapping is necessary to accommodate for inherent thermal expansion properties. As previously discussed in these guidelines, we recommend a "picture frame" design. Lumberock® Marine Grade Decking boards need to be spaced 3/16" to 1/4" side to side to provide water drainage.

The amount of expansion and contraction that will occur depends on the board's unsupported length and the board's temperature at the time of installation. Proper gapping should be followed as shown in the images below.



*Board temperature at time of installation



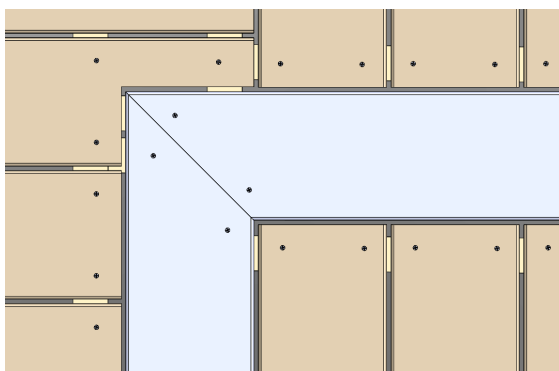
You can expect an unfastened 12ft board initially at 60°F to expand/lengthen approximately 3/16" on each end upon reaching a maximum temperature of 120°F. You can expect this same board to contract/shorten approximately the same amount upon reaching a minimum temperature of 0°F. It is necessary to allow the boards to acclimate to current installation temperatures before cutting or fastening.

Face fastening is the best option to reduce thermal expansion and contraction effects. Face fastening also protects against potential wind and water uplift.

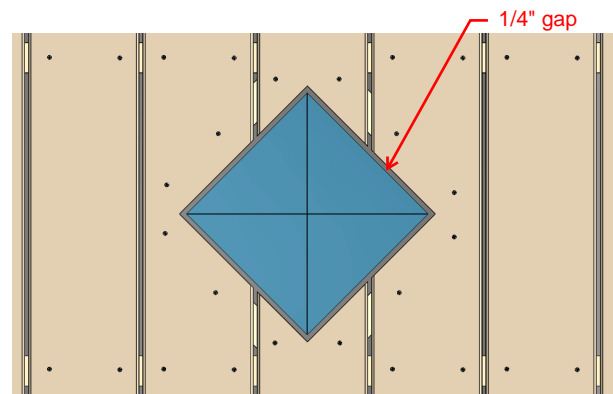
Tools and Working with Lumberock® Marine Grade Decking

Lumberock® Marine Grade Decking can be cut and shaped with standard woodworking tools. Pre-drilling is not necessary but is recommended. It also is recommended to use a carbide-tipped blade. One of the benefits of Lumberock® Marine Grade Decking is the unique ability to router and shape your cut to a beautiful finish. The original color can be regained by applying a small amount of heat to anneal the cut surface.

Lumberock® Marine Grade Decking boards can be bent, curved, and shaped using approved heating blankets and ovens. When ripping a board, it is imperative to rip both sides of the board to avoid possible curvatures. When cutting notches into Lumberock® Marine Grade Decking to go around a protruding object, such as a post or natural landscape, it is essential that you oversize the cut by a 1/4 inch to allow for movement around the object to prevent cracking of the board. Additional gapping may be required to account for anticipated movement and/or expansion of the protruding object.



Notched Decking to Accommodate Feature Board



Notched Decking to Accommodate Protruding Object from Below