



Wood Flooring Installation Guidelines



PLACING YOUR FLOORING ORDER

Quotations

Your salesperson will provide you with a written proposal based on the product selections you have made and the quantities you have provided. Upon receipt of your signed proposal and deposit, the stated lead time will begin, and the order will be entered into production in our shop.

Samples & Reference Photos

Because wood originates from trees and no two trees are exactly alike, each piece of material will vary from the next. These natural variations in the material can result in differences in texture, color, and finish throughout an order even when the same processes are applied to each piece. Pioneer Millworks provides product photos and samples as a reference for our products; however, it is impossible to show every possible variation that could be seen across an order. Therefore, variations beyond these references are to be expected. If you have a single sample piece of your chosen material, please request a range sample (consisting of multiple pieces) of your final selection(s) prior to ordering.



It is the **responsibility of the purchaser** to confirm the accuracy of **all information** outlined on the proposal including the details of each product, quantity ordered, billing and delivery address(es), and delivery contact information **BEFORE ORDERING.**

By placing the order, you acknowledge that you have read and understand the recommended installation and maintenance procedures outlined on the following pages.

Overages

Cutting waste (overage) is an inherent part of any wood installation, and the percentage of additional material should not be minimized. We suggest a minimum of 10% overage for standard wood flooring installations. If the space has numerous corners, doorways, or other conditions where additional cutting may be required, the overage percentage should be increased.

Should a patterned install of any sort be desired, whether for width, length, or otherwise, this must be discussed with your salesperson prior to ordering. Pioneer Millworks is not responsible for any material shortages resulting from patterned installation of standard materials.

Please note the overage percentage should consider not only cuts related to installation but also the discretionary cuts and defecting that may be done on site to accommodate job-specific appearance requirements. We suggest ordering enough overage to leave a few bundles of material left over for long-term repairs and maintenance. Doing so will be far less costly than additional small orders with shipping charges.

Shipping & Handling

Our in-house Logistics Team makes transportation recommendations for each proposal based on the material ordered, delivery location, order volume, and scheduling needs of the project. If your project location has any challenges such as a steep/long driveway, or a delivery in a congested metro area, or a tight residential neighborhood, it is your responsibility to inform your salesperson before placing your order.

This information will help us to provide accurate shipping costs which will be indicated as a line item on your proposal. Additional charges resulting from unforeseen conditions at delivery are the responsibility of the receiver.

If you have any questions about your delivery once your order is placed, please contact Customer Service at 800-951-9663.

SUGGESTION

Order a minimum of 10% overage for flooring installations.



YOUR RESPONSIBILITY

Additional charges resulting from unforeseen conditions at delivery are the responsibility of the receiver.

Flooring Widths

Flooring produced in a single width will have the actual face width indicated on your proposal.

Certain products from Pioneer Millworks are produced as a random width floor. By doing so, we are able to improve the yield from precious materials such as reclaimed wood. This also adds authenticity and visual interest to your floor. Flooring produced in random widths will have the nominal width range indicated on your proposal. The actual face width of these planks will be ½” less than the nominal width indicated.

Random widths are produced in our shop by square footage such that the materials received will cover the quantity ordered. There is no specific distribution of these widths, however at least 20% of the order will be covered by any single width. It is therefore important that any random width floor is not installed in a repeating pattern. Your packing list will provide the square foot quantity of each width received, and we suggest coordinating the frequency/repetition of the widths as well as visual goals of the project prior to beginning installation. Even if similar square footages of each width are received, this does not imply any repeating pattern of installation, and there is no guarantee that a pattern of the widths received in your order can be repeated successfully across the room(s).

If a repeating pattern of certain widths is desired, the flooring must be ordered as an equal linear footage of each width. Our team can assist with calculating how much of each width is required for your order.



NOTE

**Keep random RANDOM
when installing.
Assess packing list of
percentage of widths prior
to installation.**

Engineered vs. Solid

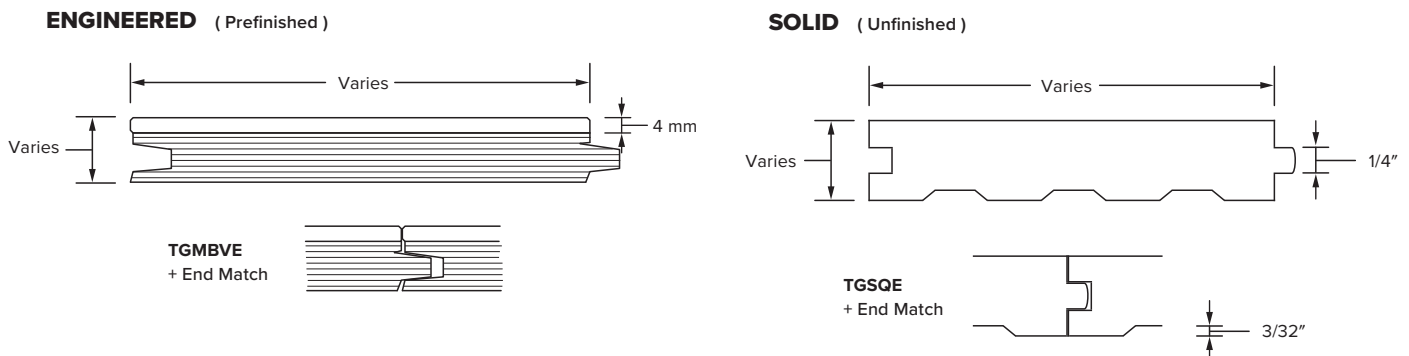
Pioneer Millworks crafts flooring in both solid and engineered products. Solid flooring is exactly as it sounds, 100% solid wood, milled with a tongue & groove, typically nailed down and installed at or above grade. Engineered flooring is composed of a 3/16" thick wood "wear layer" which is bonded with a plywood substrate. Because of the inherent stability afforded by the multi-layered nature of engineered flooring, it can be installed below, at, or above grade, and can be nailed or glued to proper substrates, or even floated if desired.



Both solid and engineered flooring from Pioneer Millworks can be sanded and re-finished multiple times. Your sales representative will assist you in selecting the best flooring for your specific installation.

Milling Profiles

The below drawings show our typical wood flooring profiles, with the width and thickness varying by product. Please refer to your proposal or ask your salesperson for details.



S4S materials can be ordered for trim. Note that there is no relief cut on the back of these materials. Where a product has an original patina or a skip-planed surface, the back and edges will be milled (S3S) bright with one original face.

RECEIVING YOUR FLOORING

Your order will arrive on skids in “hand-bundles” of approximately 15-25 sf each. These hand-bundles are stacked and banded to the skid, and each skid covered by breathable lumber wrap with the ends shrink-wrapped. Before unloading, inspect the skids for any visible damage to the skid and/or the product. If any damage is found, please notify the driver and take photos for record, as well as noting the damage on the bill of lading before it is signed. Then notify Pioneer Millworks logistics team immediately.

Unless specific arrangements are made otherwise, the receiver is responsible for all equipment and labor to unload the order from the truck.



Inspection

All materials have been graded per the specification sheets for the product purchased. During transit and unloading, and due to changes in the surrounding environment, it is possible for minor defects beyond these specifications to appear. Depending on the material, these may include loose/missing knots, scratches or finish damage, as well as inherent cupping, bowing, twisting, or crowning. Because of natural variations in wood, boards that lie slightly above or below these specifications may be found in any order. Please refer to the grade specifications for your product at: www.pioneermillworks.com/product-spec-sheets. Contact the team at Pioneer Millworks with any questions.

Handling

While the finishes used on our pre-finished wood flooring are robust, they can be damaged by rough or improper handling of the planks. We recommend longer planks of any wood flooring be lifted by one person at each end, and that care is taken to not allow other materials or objects to scrape against the surface.



YOUR RESPONSIBILITY

After unloading, please unpack and further inspect your material, and inform us within 3 business days of any discrepancies.

Otherwise, it will be assumed that the correct product and quantity was received and after this time, no claims for material shortage or damaged materials will be accepted.



YOUR RESPONSIBILITY

Proceeding with the installation of any material constitutes acceptance of the materials as delivered. Pioneer Millworks is not liable for any costs for labor, materials, or replacement related to any products that have been installed with defects, damage, or discrepancies.

Storage

The packaging on our skids is designed to protect the product in transit, but it is not intended to provide protection for long-term storage outdoors. All wood flooring materials should be moved indoors immediately upon delivery and stored in a climate-controlled environment.

Jobsite Requirements

Prior to installation, any “wet work” involving water, concrete, plaster, or similar materials should be completed. The indoor environment must have proper HVAC systems operating to maintain living conditions at 60-70F/15-21C and humidity levels between 35-55% for a minimum of one week prior to installation. These conditions must be maintained throughout installation and the life of the structure to minimize movement in the wood once installed.

Importance of Subfloor Flatness

Subfloor flatness is critical in flooring installations, especially those that include borders, inlays, and flooring patterns. Any irregularity in the subfloor will be mirrored in the finished floor.

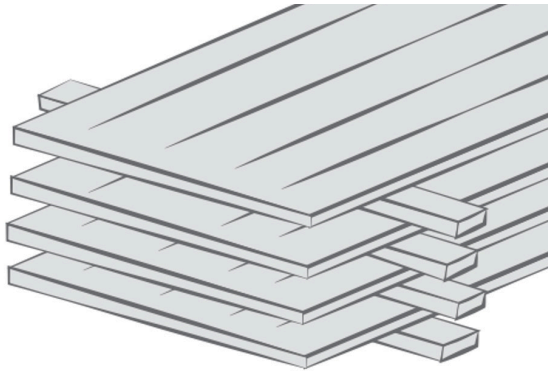
Wood Subfloors: NWFA’s Installation Guidelines specify that wood subfloors must be flat, clean, dry, structurally sound, free of squeaks, and free of protruding fasteners. For installations using mechanical fasteners of 1½” and longer, the subfloor should be flat to within ¼” in 10’ or 3/16” in 6’. For glue-down installations and installations using mechanical fasteners of less than 1½”, the subfloor should be flat to within 3/16” in 10’ or 1/8” in 6’. If peaks or valleys in the subfloor exceed the tolerances specified, sand down the high spots and/or fill the low spots with a leveling compound or other material approved for use under wood flooring.

Concrete Subfloors: NWFA’s Installation Guidelines specify that a concrete slab should be flat to the wood flooring manufacturer’s specification. Typically, manufacturers will specify a flatness tolerance of 1/8” to 3/16” in a 10’ radius. If the slab is out of specification, high spots can be removed by grinding and depressions can be filled with approved patching compounds. Slabs also can be flattened using a self-leveling concrete product specified for wood flooring. When sanding or grinding concrete, minimize the amount of silica dust produced. Follow OSHA safety recommendations for dust collection and use of approved respiratory and eye protection. Before you begin installing, ensure that materials and job-site conditions are appropriate for installation. For guidelines on job-site conditions, grade levels, subfloors and acclimation, and radiant slab installations, refer to the NWFA publication Installation Guidelines.

Acclimation

Wood is hygroscopic and will respond to changes in humidity by expanding or contracting accordingly. Just as it is important to allow your flooring to acclimate to your living conditions prior to installation, it is equally important to note that any substrate upon which the flooring will be installed is properly acclimated or cured.

- Store flooring on a flat, dry, level surface away from exterior walls.
- Planks should be unbundled and stacked with space between each layer using perpendicular shorter planks from the order, or ¾"+ thick strips of wood as shown



- As the planks are being stacked, check the moisture level of the flooring using a properly calibrated moisture meter, testing at least 10-15 random planks for every 250 sf delivered.
- Also using a moisture meter, perform the same number of tests on the wood substrate that the flooring will be installed over.
- If installing directly over concrete, refer to National Wood Flooring Association (NWFA) guidance on concrete testing in addition to the adhesive manufacturer's requirements.
- Acclimate materials in the living conditions outlined previously until the difference in average moisture level between the wood substrate and the flooring is 2% or less, using fans to gently circulate air throughout the stack(s).
- The amount of time required for acclimation varies widely, but in most cases, 1-2 weeks is sufficient.

SUGGESTION

Wood moisture meters are easy to find online or at your local hardware store.



NOTE

HVAC system should be running/active steadily prior to acclimating the wood. Be sure it remains running throughout the acclimation process so the wood is exposed to the same conditions that will exist for the life of the space.

INSTALLING YOUR FLOORING

Because design, jobsite location, climate, contractor preference, and numerous other factors help to dictate the way wood flooring can be installed, Pioneer Millworks recommends referencing the NWFA publication “Wood Flooring Installation Guidelines” for thorough and complete information.

When installing over concrete, we *highly recommend* installing a plywood substrate over the concrete as shown in NWFA guidance.

When installing below grade, **do not use solid wood flooring**. Engineered flooring may be used with proper adhesives and primers to glue down to concrete; refer to NWFA guidance and instructions by the adhesive manufacturer.

When directly gluing over a Gypcrete subfloor, do not use solid wood flooring. Engineered flooring may be used in conjunction with a wood flooring adhesive properly formulated to work with Gypcrete.

SUGGESTION

We highly recommend installing a plywood substrate over the concrete as shown in NWFA guidance.

Helpful Hints: NAIL-DOWN WOOD FLOORING

- Be sure the plywood subfloor is firmly secured and free of any protruding fasteners
- Subfloor must be flat within ¼” over 10’. If necessary, sand high-spots and use an appropriate leveling compound for low areas prior to installation
- Install 15# roofing felt over the plywood subfloor to reduce squeaking
- Always leave a ½” expansion gap at the perimeter of the floor
- If using planks wider than 6”, flooring adhesive or face-nailing may be used in conjunction with the recommended nailing pattern.
- Regularly sweep and vacuum the subfloor and wood flooring during installation
- Provide protection under any tools & equipment being moved during installation

Helpful Hints: GLUE-DOWN WOOD FLOORING

- Select the proper adhesive for the wood flooring material and dimensions ordered, as well as for the substrate upon which the floor will be installed.
- Follow adhesive manufacturers recommendations for leveling, primers, and equipment to ensure proper installation.
- Always leave a ½” expansion gap at the perimeter of the floor
- Use 3M Delicate Surface Tape to hold planks together while glue sets. Remove tape as soon as possible.
- Regularly sweep and vacuum the subfloor and wood flooring during installation
- Provide protection under any tools & equipment being moved during installation

Floor Protection

During and following installation/finishing, we recommend placing a protective surface such as Ram Board over the flooring until all other work is completed. Use a shop vac with a brush attachment to remove dust and debris from the floor. **DO NOT, UNDER ANY CIRCUMSTANCES, WET MOP THE FLOOR TO REMOVE CONSTRUCTION DUST AND DEBRIS.** Refer to Pioneer Millworks Finish Maintenance Guide for the best practices for maintaining the finish used on your order.

MAINTAINING YOUR PRE-FINISHED FLOORING

Continue to maintain the living conditions of the interior space at 60-70F/15-21C and humidity levels between 35-55%. Some seasonal movement may still be observed during extremes of dry or humid air throughout the year. As a result, natural expansion and contraction of wood (which may result in subtle changes in dimension) is to be expected and occasional cupping, crowning, or cracking may be observed, even in engineered materials.

Direct sunlight can fade the color of flooring. Curtains, blinds and other window treatments which help to filter sunlight and/or reduce the intensity can help to protect the surface.

These natural reactions to the surrounding environment are not a defect in the material or finish, and cannot be controlled.

Refer to Pioneer Millworks Finish Maintenance Guide for the best practices for maintaining the finish used on your order.

Touch Up Finish

Most minor scratches in Pioneer Millworks flooring pre-finished with our hardwax oil finishes can be touched up using Pure hardwax oil from Rubio Monocoat. This non-tinted finish will help to protect any exposed wood fiber and will look much better than attempting to match the color. Rubio Monocoat Pure hardwax oil is available for purchase online and in woodworking stores.

Flooring with our Commercial Topcoat or Naked finish cannot be effectively touched up in this same manner. Please refer to the maintenance sheet for your specific finish.



DO NOT

**DO NOT WET MOP
WOOD FLOORING.**

Warranty

Refer to Pioneer Millworks warranty page at: https://pionermillworks.com/sites/default/files/2022-10/2022_10_4_PMW_Warranty.pdf

No warranty of any kind is made regarding the longevity, durability, or color of any finish on our flooring products.

Pioneer Millworks is not responsible for any movement (expansion, contraction, cupping, crowning, bowing, twisting, checking, etc) which may occur following production at our facility, in storage prior to/following shipment or delivery for any length of time, while in transit, or on the jobsite before, during, and after installation. All movement in wood is a natural reaction by the product to the surrounding environment and is not able to be controlled through any manufacturing process.

These guidelines are provided as a reference for best practices. The purchaser is ultimately responsible for the proper selection and installation of the product and associated fasteners, as well as the selection and installation of all other components of the structure. All products must be installed in accordance with local building codes and regulations; questions about specific local codes must be directed to your local code enforcement official. Pioneer Millworks recommends installation by an experienced and qualified professional contractor. Pioneer Millworks accepts no responsibility for any product failure due to improper jobsite conditions, installation, or maintenance.