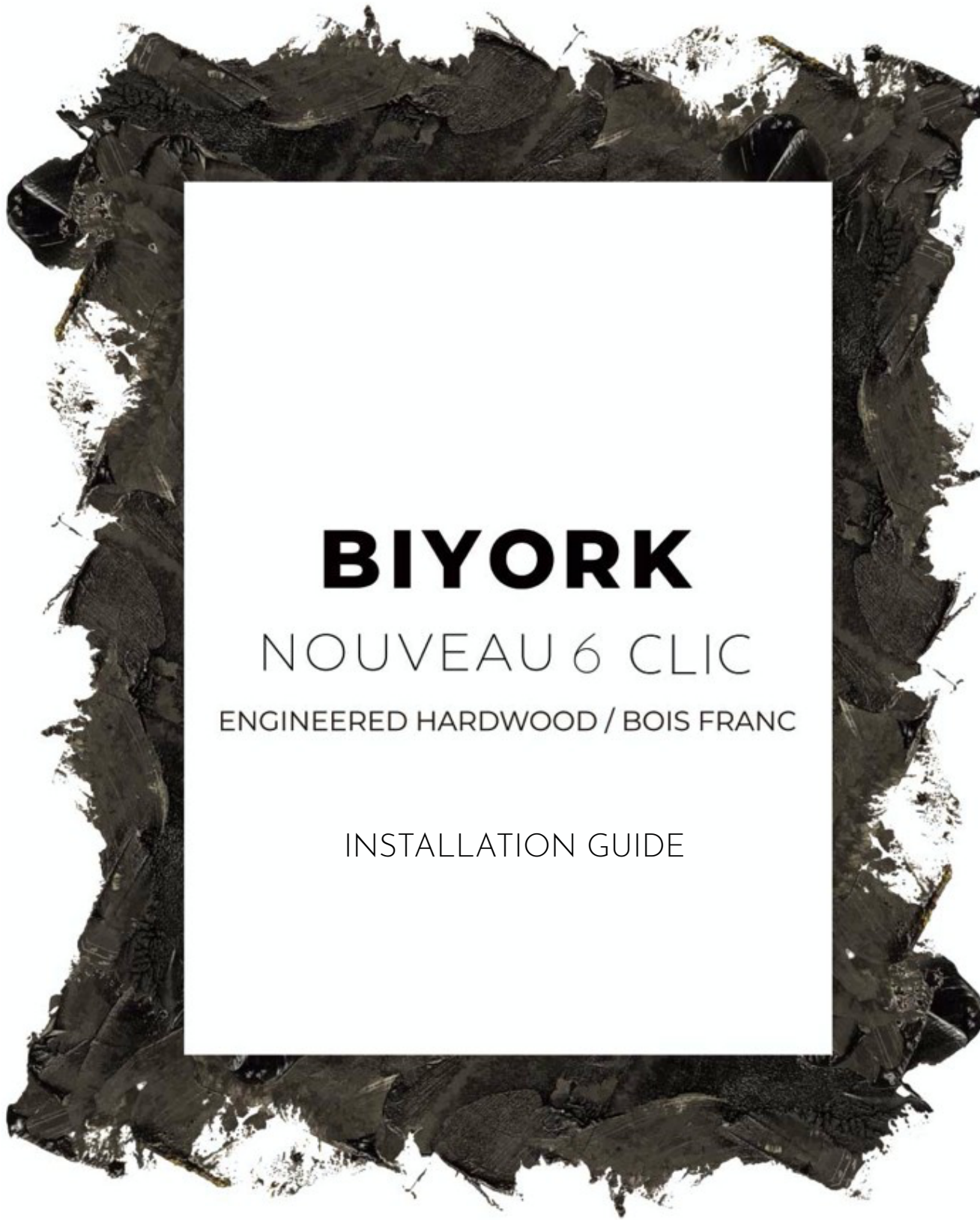




BIYORK

NOUVEAU 6 CLIC

ENGINEERED HARDWOOD / BOIS FRANC

INSTALLATION GUIDE

Always refer to recommended instructions prior to installation.
Any method indifferent from this document may void your warranty.



BY INNOVATION. BY DESIGN. BIYORK.

Every aspect of our floors are designed in pursuit of performance ready for the world.

We believe that everything we do is a movement towards an alluring combination of Dynamic Performance and Modern Craftsmanship.

We do this by making every inch of our floors push the boundaries of Innovation forward with Beautiful Designs, Ease of Installation and Our Obsession for the Next Best Thing.

Together, we deliver the foundation that reflects your Personality and create the Ultimate Statement in any space.

This is BIYORK.

TABLE OF CONTENTS

BEFORE YOU START	3
ON-SITE PREPARATION.....	4
ACCLIMATION	4
THE SUBFLOOR	5-8
INSTALLATION	9-13
RADIANT HEAT	14
AFTER INSTALLATION.....	15
MAINTENANCE.....	15-16
HOMEOWNER RESPONSIBILITY	17

Installer/Owner assumes all responsibility to inspect all flooring before installation. Inspect each board carefully for damage prior to installing it. Our floors are manufactured in accordance with accepted industry practices which permit a defect tolerance not to exceed 5%. These defects may be the result of manufacturing or naturally occurring characteristics of the wood material. It is recommended that a minimum 5% cutting or grading allowance be added to the total square footage required. Boards that are judged to be defective should not be installed or should be installed in an inconspicuous location where they will not be noticeable (e.g., inside a closet). If the installer/owner feels flooring material is off-grade, wrong colour, improperly manufactured, wrong gloss level and finish problems, DO NOT INSTALL the flooring. Immediately contact the seller from which the flooring was purchased. The installer/owner is fully responsible for all installed hardwood flooring.

"Installation Warrants Acceptance"

Prior to installation of flooring, installer/owner must determine that the jobsite environment and subfloor meet or exceeds all applicable standards.

Biyork Warranties DO NOT cover materials or labour that are installed with visible defects.

Biyork declines any responsibility for wood floor failure after installation resulting from job site environment, construction damage, or subfloor deficiencies.

CAUTION: WOOD DUST

Wood dust becomes a potential health problem when wood particles from cutting become airborne. Breathing these particles may cause allergic respiratory symptoms, mucosal and non-allergic and possible cancer. The extent of these hazards and the associated wood types has not been clearly established. It is recommended to use Power tools equipped with a dust collection system. If high dust levels are unavoidable, an appropriate NIOSH-approved dust mask should be used. Avoid contact with eye and skin.

Avoid constant exposure to excessive temperatures or direct sunlight for extended periods of time since this might cause planks to expand/separate or change colour and or fade. Please consider these variables when selecting your flooring product.

ON-SITE PREPARATION

4

EVALUATE JOBSITE TO ENSURE READINESS

All wood products are hygroscopic, they will contract and expand with the changing of the seasons. The use of appropriate environment may reduce the degree of contraction (shrinking) and expansion.

Make sure your project site is ready. All wet trades (concrete, plastering, masonry, drywall, spray texture, and painting) should be completed with ample time for drying allowed. New concrete must be cured at least 60 days prior to delivery of wood floor. The building should be enclosed and the heating/cooling/system operational for a minimum of 14 days. The flooring should not be delivered until the environment is at normal living conditions (approximately 70° F and interior relative humidity between 35 to 55%). Cartons of our products must be opened and be laid flat in the room where they are to be installed for a minimum of 72 hours before being installed.

A 6mil Poly vapour barrier is recommended to mitigate excessive moisture.

NOTE: Please ensure no part of the floor is in contact with any foreign surface that may cause potential issues after installation. Please allow a minimum of "1/2 inch" of space as a buffer around any piece of furniture, walls, mouldings, columns, etc.)

ACCLIMATION

Biyork recommends the engineered wood flooring be acclimated in a controlled environment before installation for 72 hours.

Acclimation depends on geographical location, interior climate control, and time of year. The reason for acclimating the wood flooring before installation is to allow the moisture content of the wood to adjust to the installation jobsite's "expected normal living conditions"- that is temperature and relative humidity that will be experienced once the structure is occupied. Typically, RH fluctuates no more than 20% per geographical location.

- Jobsite Conditions must be maintained between 60-80°F (15-26°C) and relative humidity between 35-55% before, during and after the installation.
- Cartons should be store away from any heating/cooling ducts, away from direct sunlight, and have 5" of airflow around is require for the cartons to be stored with.

BIYORK CANADA allows the following types of subfloor:

- Plywood 5/8" - OSB 23/32" (Truss/Joist of 16" c/c or less)
- Plywood 3/4" T&G - OSB 23/32" (Truss/Joist of 19.2" c/c or less)
- Concrete
- Concrete or Plywood with Radiant Subfloor Heating
- Ceramic tiled floor, terrazzo, slate, and marble

Subfloor Requirements

- Clean - Scraped or sanded, swept, free of wax, grease, paint, oil and other debris.
- Horizontal and Flat - Maximum tolerance of 5mm over 3m (3/16" over 10') or 3mm over 2m (1/8" over 6')
- Sand high areas or joints. If the floor is glued, fill the fill low areas with a latex additive cement surfacing product with a minimum resistance to compression of 20 000 kPa.
- Concrete Slabs (regardless of existing floor covering): Use an approved calibrated Concrete Moisture Meter as a preliminary measurement for moisture. Concrete subfloors must be finished at least 30 days before performing a test. Acceptable verification methods: Perform a polyfilm test. Tape down 2' x 2' polyfilm squares (a clear garbage bag or plastic drop cloth will do) in several places on the floor. Wait 24-48 hours, and then check for the appearance of condensation on the inside of the bag or plastic for a darkening on the concrete subfloor. Either occurrence signals the likely presence of excess moisture, which needs other measures with the concrete moisture meter Tramex. The measure must not climb over 4,5 on the superior graduation.
- Wood Substrates: Test the moisture of the wood substrate using a calibrated moisture meter approved for testing wood moisture according to the meter manufacturer. The reading should not exceed 12%, or read more than a 4% difference than moisture content of products being installed.

Jobsite Moisture Requirements

Concrete Subfloors

- Moisture testing is an essential part of determining the suitability of a concrete slab to receive our engineered hardwood floor covering. Moisture testing must be performed on all concrete slabs and should be conducted with the area at service conditions (i.e., with the permanent HVAC in operation, fully enclosed with all outside doors and windows, radiant heat in full working order).

Concrete Subfloors must be tested for moisture as per ASTM Standards.

- Calcium Chloride Test (ASTM F 1869): The maximum vapor emissions cannot exceed 3lbs/1000SF in 24 hours.
- In-Situ Probe Method (ASTM F 2170): The Rh levels should not exceed 75%. Testing procedure can be found in the NWFA installation guidelines.

Wood Subfloors

- There are many methods to test the moisture of subfloor. We recommend the test to be done with a quality moisture meter such as Delmhorst, Wagner, Tramex, or Lignomat.
- Use a pin or pinless wood moisture meter to test the moisture. The wood subfloor moisture content should not exceed 12%. (the subfloor should not exceed 4% differential between the ENG hardwood floor & subfloor)
- Moisture testing on wood subfloor requires 20 measurements per 1,000 SF.

Subfloor Requirements

Our engineered flooring may be installed over concrete, OSB, or plywood subfloor within the following parameters:

- Subfloor must be flat, meeting a minimum of 3/16" in 10' radius and/or 1/8" in 6'. Level low spots with appropriate leveling material.
- Subfloor must be clean. Scrape or sand the subfloor to remove all foreign materials.
- Subfloor must be free of loose areas and squeaks before installation can start. Re-secure any loose subfloor as necessary.
- Subfloor must be dry before you begin installation (see moisture testing above).

Concrete

- New concrete slabs require a minimum of 60 days drying time before covering, the slab must be fully cured.
- Ensure concrete has a minimum of 3000 PSI compression, lightweight concrete less than 3000 PSI use a floating installation.
- To check for lightweight concrete, draw a nail across the top of concrete surface. If it scratches or indents, it is probably a lightweight concrete.
- Remove all paint, oil, existing adhesives, wax, grease, dirt, sealers, and curing compounds. Do not use solvent-based strippers the residual solvents can prevent the satisfactory bonding of the vapor barrier and/or adhesive systems.

Biyork is not responsible for the connection between the flooring and concrete substrate.

Wood Subfloors

- Biyork requires subfloor of 3/4" (23/32", 18.3 mm) CDX grade plywood subfloor/ underlayment (Exposure 1), 4'x8' sheets or 3/4" (23/32", 18.3mm) OSB sub floor/ underlayment grade, PS2 rated, sealed side down, with joist spacing of 19.2" (475) on center or less.
- Minimum Subfloor: 5/8" (19/32, 15.1mm) CDX plywood subfloor/underlayment (Exposure 1), 4'x8' sheets, maximum 16" on center joist construction.
- Follow subfloor panel manufacturer's recommendations for spacing and fastening schedule.
- 1x6" pine subfloor over joists 16" on center is acceptable as long as structurally sound. Do NOT nail over particleboard or products of a similar nature as you will void your warranty.
- If high or low spots in the subfloor exceed the tolerances specified above, sand down the high spots and fill the low spots with leveling compound approved for installation method, or other material approved for use under wood flooring. NWFA states it is the builder's or general contractor's responsibility to provide the wood-flooring contractor with a subfloor that is within the tolerances listed above.
- Nail or screw any loose areas of wood subfloor prior to installation to minimizing subfloor squeaking. Any subfloor with excessive vertical movement will cause squeaking
- Check for appropriate subfloor moisture levels as per NWFA requirements.

INSTALLATION

Required Electric Tools

- Table Saw
- Electric Miter Saw
- Band Saw, Chop Saw
- Power Jamb Saw, or Jig Saw

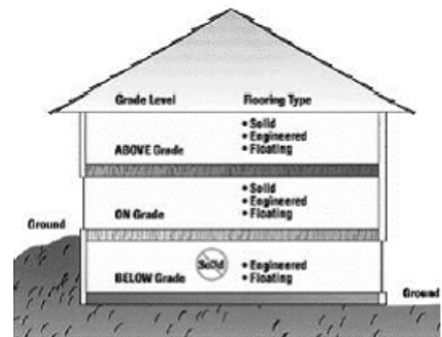
Required Hand Tools

- Broom and Dust Pan or Vacuum
- Tape Measure
- Moisture Meter (Wood, Concrete or Both)
- Power Jamb Saw, or Jig Saw
- Chalk Line & Chalk
- 3M Blue Tape
- Hand Saw
- Hammer
- White Rubber Mallet
- Tapping Block
- Pry Bar
- Filler Stick and Touch-Up Marker
- Hardwood Floor Cleaner

Accessories

- 6mil Poly Vapour Barrier
- Underlayment (Only if required)

Kitchen Cabinets and Islands: Kitchen Cabinets & heavy islands must NOT be installed directly on top of the flooring. (They should be installed prior to the installation of the flooring). A floating floor system should never be pinned down by heavy objects as this will limit the flooring's ability to expand and contract during seasonal change.



If the soil surrounding a structure is 3 inches or more above the floor of any level, consider that level below grade. This includes walk-out basements. In addition, the surrounding soil should be sloped away from the structure.

Wall Line Layout

- Starting from the longest wall will provide the best visual effect.
- Stagger all plank end joints at least 6" apart in adjacent rows, avoid H patterns
- Engineered Flooring can have slight colour variations in between production runs. Before starting the installation, it is best to check the production run # which is indicated on the label on the carton. If you find that you have cartons from different production runs, it is highly recommended to open cartons and mix of planks from each different production run on your floor. This will result in a more natural-looking floor.
- Work from 4 or more cartons to ensure maximum colour and shade blend.
- The use of pull bar and tapping block is recommended to ensure a successful installation. For the use of pull bar on the last piece of flooring in the row and during row installation, hold the tapping block firmly in place and gently tap the plank into place.
- Select and use the straightest and longest planks should be used for the first few rows. Lay the remainder out on the floor in the general pattern in which they will be installed. Those with concerns must be removed and cut. They can be used as starter or closing planks, or in closets, under cabinets, or discarded as waste.
- Lay the groove edge of the flooring facing the wall, leaving a minimum of 1/2" expansion space between the groove edge and the starting wall. This expansion space will allow for the wood to expand if necessary due to environmental changes
- Lay the first row and top nail surface 10 to 12" apart on face of flooring, and countersink if necessary. Fill holes with approved matching wood putty.

Installation

NOTE: It is important to include an expansion space of 5/8" (1.5 cm) between rooms (ex: hallway adjacent to a bedroom). You will need to fill this space with a molding. Same rule applies for rooms exceeding 26 feet (8 m) and/or 52 continuous feet (16 meters), you will also need an expansion space and a molding.

We do recommend the use of transitions between doorways or bedrooms, or between different floor coverings where they meet. Use a piece of flooring to set correct height to cut bottoms of door frames. An expansion gap will still need to be present when the flooring is installed under all door frames.

DO NOT install cabinets or other fixed objects on top of the flooring. Undercut all doorjambs and make sure to provide proper expansion space 5/16" (8mm) around all vertical obstructions. Do not fasten base moldings and or transition strips to the planks.

Step 1 - Install Underlayment

Install a 6mil Poly Vapor Barrier over entire flooring substrate. Overlap sheets 16 inches and tape together to create an airtight seal. Run the vapor barrier 1 to 1.5 inches up the walls and secure in place with tape. Using underlayment, roll out one roll at a time over the vapor barrier. There are many types of underlayment available today. The use of acoustical underlayment will improve the feel and sound transmission of your flooring.

Step 2 - Preparing the Starter Rows

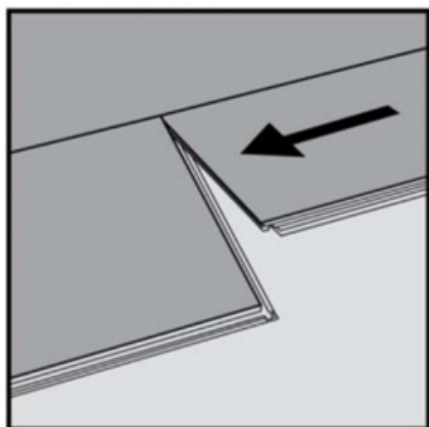
It is very important that enough expansion gaps are kept between the flooring and all the walls. This is done by placing 1/4 inch (6 mm) spacers every 8 inches apart around all vertical walls. Measure the width of the room - perpendicular to the direction you intend to install the flooring. The last row of flooring should be no less than 1-1/2 inch wide. If it is less, you should rip-saw the starter row narrower. Leave 1/4 inch (6 mm) between the wall and the end of each strip in each row. Start the second row with a strip of at least 6-inches (15 cm) shorter or longer than the strip used in the first row. This will avoid aligning or clustering the end joints.

INSTALLATION

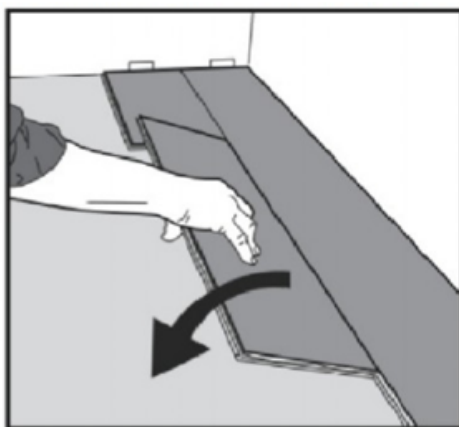
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Step 3 - Floating Floor Click System (No Glue, Nails, or Cleats Necessary)

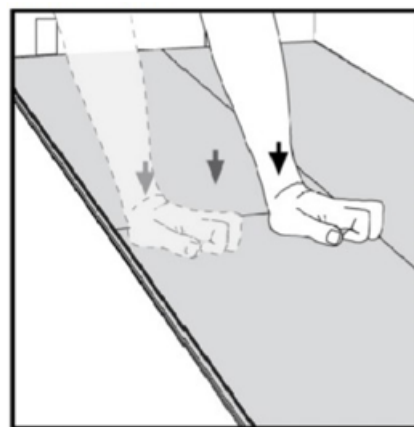
Place the plank gently and tight to the short end of the previous plank.



Fold the plank down in a single action movement with a slight press to the left to the short end of the previous plank. During the fold down, make sure the planks are right against each other.

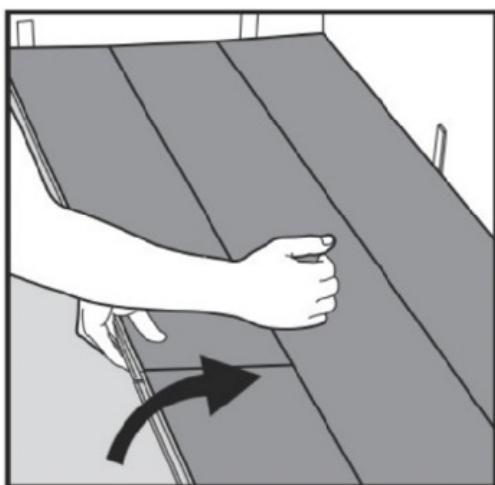


Use a white rubber mallet to lightly tap or press/knock slightly along the short end of the installed plank to fully engage the click system.

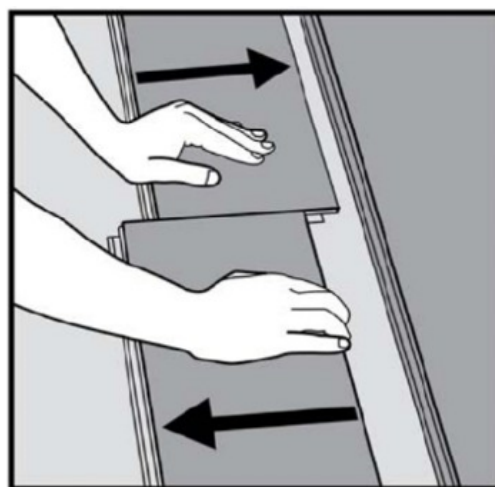


Disassembly

Separate the whole row by carefully lifting up and slightly knocking just above the joint. Fold up and release the whole long side.



Disassemble the planks by sliding horizontally. (Do not fold up)



Final Step - Complete The Installation

At the end wall use a pry bar, if needed, to pull the ends of the boards tight. Continue laying the floor on top of the underlayment, working left to right, tapping the strips tight together. Make sure to continue using ¼ inch spacers along the wall throughout the installation. The last row will most likely require cutting to width, but it should be no less than 1 ½ inch wide. To do this, place a full row of strips on top of the last row installed. Insert a ¼ inch spacer against the wall, and using a full width strip, trace distance from wall onto final row. Cut strips for the final row to designated width. Apply glue and pull into place with a pry bar. Finally, install the transition pieces, baseboards and/or, quarter round mouldings.

Biyork Engineered Click Hardwood floors are approved for installation over radiant heated subfloors using floating method over radiant heat ONLY for the applicable product (Hickory is not a suitable species over radiant heat. As it has the tendency to split and check when low moisture content levels are present). Nail or Staple Down installation methods are not recommended for Radiant Heated Subfloors.

The heating system must be functional and working for at least 7 days prior to the floor installation.

Stop the heating and let the floor cool down to ambient temperature for 3 or 4 hours before starting the floor installation.

Immediately start the radiant heating system after the installation. The temperature of the finished surface cannot go over 27 °C (80 °F) at all times for the duration of the flooring's life span.

Radiant heating systems usually procure a dry heat which can lower the ambient humidity level. It could be necessary to use a humidifier to maintain a recommended level of 40 % to 55 % and prevent any damage to the floor.

Flooring installed on a radiant heating system must be glued at each end, in order to reduce the shrinkage in length. Apply a layer of recommended wood glue on the grooved side before inserting the strip.

HYDROGEN 5 is approved to be installed over radiant heated subfloors. The heating system either "hydronic or electric" must be tested and fully operational at normal living temperatures. Please allow for cement/mortar cure times to ensure proper installation of heating system if applicable.

HYDROGEN 5 is compatible with a concrete subfloor with an in-floor (embedded) radiant heating system. There must be a minimum of 1.25cm (1/2") separation between SPC and radiant in-floor heat system.

- Before installing, make sure the heating system has been pressure tested and set to maximum heat (81°F) to force out any residual moisture and to make sure the system is working properly.
- Shut down the heating system at least 48 hours before, during, and after installation.
- Keep room temperature between 68°F and 77°F during the installation. BIYORK ENGINEERED Hardwood floors are approved for installation over radiant heated subfloors using either floating method or Glue down over radiant heat ONLY for the applicable product (Hickory is not a

suitable species over radiant heat. As it has the tendency to split and check when low moisture content levels are present). Nail or Staple Down installation methods are not recommended for Radiant Heated Subfloors)

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- Flooring installed on a radiant heating system must be glued at each end, in order to reduce the shrinkage in length. Apply a layer of recommended wood glue on the grooved side before inserting the strip
- After flooring is installed, the temperature of the radiant heat floor may be increased gradually 48 hours after installation, in increments of 5°F, but the surface temperature should never exceed 80°F. Contact the radiant heating manufacturer for further recommendations.
- Radiant Heat Systems must have fail-safe capabilities to ensure surface temperatures **DO NOT EXCEED 26.6 degrees Celsius or 80 degrees Fahrenheit.**

SPC STAIRNOSE INSTALLATION

14

- **HYDROGEN 5** stairnose profile is not a click joint. The back lip of the plank or tile only slides and rests in the groove of the nosing, creating a flush finish.
- Ensure the plank or tile fits properly into the groove. A knife may also be required to clean any excess core material in the groove for a tight fit.
- For best results, the bottom of the nosing that rests directly in the subfloor or stair, can be lightly sanded for supreme holding strength with the adhesive.
- **BIYORK CANADA** recommends using a 1/4"x1/4" square notch trowel to apply construction adhesive to achieve an even coat for optimal adhesion and support.
- PL Premium construction adhesive is recommended to secure and hold the nosing down. (Please note that PL premium takes 10 to 12 hours to cure)
- Painter's Tape and direct weight (heavy object) can also be used to hold the nosing in place, while the adhesive is curing if required.
- After 10 to 12 hours, the stairnose will be secure and the installer can work off the nosing. Crazy glue can also be applied into the groove of the stairnose to create an instant bond between the stairnose and plank or tile. (Be careful not to walk on or disturb the nosing during this process)
- If an installer needs to work immediately off the nosing that day. A couple of brad nails in a discreet area on the face of the nosing can be used to hold the nosing down in place, while the adhesive is curing.
- The immediate plank worked off the nosing can also have a lazy S of PL adhesive to prevent movement at this connection. (Only if required)
- Avoid applying excessive adhesive when installing transitions as it may act as a pinch point to a floating floor.

All floor coverings require some care to look their best; many problems can be prevented before they occur. The type and frequency of traffic on your floor covering will determine the frequency of maintenance needed. The type of flooring and even the colour will also have some bearing on how much care may be necessary. For example, solid colour floorings will show scuffs, scratches, dirt, and general wear to a greater degree than multi-colour chips or patterns. Of course, white, or light colours will show staining to a greater degree than darker colours. For this reason, solid colour and white flooring should receive special attention concerning preventative maintenance and the amount of care provided. Proper selection when choosing the type and style of flooring will help prevent maintenance related problems after installation.

First time for optimal maintenance. Best within 24 hours of installation.

- Regular cleaning is a proven way to help keep your SPC flooring in top shape.
- Establishing a regular maintenance regime will keep your floors looking beautiful for years to come.
- Sweep/Vacuuming: Sweep at least once a week to remove any dusty loose dirt, small pebbles. Before vacuuming, be sure to check the condition of the beater bars.
- Mop: Never use abrasive cleaners. Only use recommended/approved vinyl floor cleaners along with a microfiber cloth.
- Harsh Chemicals: Do not use vinegar or one step cleaners/polishing agents or oil soaps on Hydrogen Products. These products can leave a film or residue, change the sheen level, and affect the wear layer over time.
- **Never use a steam cleaner on Hydrogen.** The hot steam is doing more harm than good to your SPC flooring. The excessive heat together with the moisture that seeps in the joining edges can weaken the adhesive bonds and layers of the floors structure. It will also cause irreversible damage like warping edge cupping, bending, and bubbling of the plank or tile.
- Spills: Clean up any spillage instantly by simply wiping it off with a damp cloth. The click system does not prevent liquids from seeping under. Wipe away any liquids spilled as soon as possible. Be sure to wipe the area dry once you are done. (The longer the spills are left unattended the more likely they are to permanently stain the flooring). However, some stubborn stains are more difficult to remove. Common stains like juices, red wine, food and grease, marker pens, paint, or lipstick. Apply mineral spirits to a clean

cloth to slowly release the stain. Once the stain has been lifted use another damp cloth with water to clean up the stain, this also helps dilute the mineral spirits off the surface. Dry off when complete.

MAINTENANCE

16

- **Minimize dirt:** Invest in a good quality rug, non- stain or non- rubber backed doormat in front of all entrances to prevent any sand, loose soil, grit, dust, and other dirt being carried into the house. It is best to place a doormat at every entry point.
- **No Shoes:** One of the most effective ways to reduce dirt: simply adopt the 'no shoes' policy. This can further eliminate possible dirt from outdoors and maintain SPC floor hygiene at the same time. Adopting the no shoe policy will cut down the chances of scratches caused by stones and sand that are carried along when you have your shoes on. Stiletto shoes should not be worn on the flooring as they can cause permanent damage.
- **Heavy Protection:** Protect your SPC flooring with quarter-inch plywood, or cardboard when moving furniture or changing out appliances. This will help prevent scratches and scuff marks.
- **Damage from Dryer/Washing Machine** on top of a floating floor is not warranted.
- **Any colour changes** from chemical reactions from rubber area rugs or surface contaminants are not warranted.
- **Pets:** If you are a pet lover, do watch out as animals' nails will also leave scuff marks on your floor. Trimming the nails and claws of your pet regularly will help minimize potential scratches.
- **Future Protection:** Another way to avoid unwanted scratches and scuff marks is to install felt pad protectors underneath tables, chairs, desks, couches, etc. As most furniture items in the home are constantly moving and sliding on the flooring, felt pad protectors will help eliminate and protect the flooring from surface scratching. They should be checked and replaced when required. Check the condition of all casters or rollers on the furniture before placing the furniture on the floor.
- **Sunlight and Excessive Heat:** Prolonged exposure of direct / extreme sunlight may cause your SPC flooring to fade, become dull or discolour. Hydrogen floors must be protected from direct sunlight. We recommend the use of blinds or curtains on all windows that allow direct or extreme sun exposure. This will also help limit uncontrollable heat. Flooring exposed to excessive heat can be affected by thermal expansion, which can cause the floor to bend or undulate.
- **BIYORK CANADA** is not responsible for any damaged or defects caused from the effects of the sun.

To maintain the **BIYORK CANADA** warranty, the homeowner is responsible for the following tasks:

- Please ensure the colour and appearance of materials are accurate prior to installation.
- Please read the installation and warranty document prior to the installation of the Hydrogen SPC flooring.
- Follow our cleaning and maintenance guidelines to properly maintain your investment.
- In the case of any repairs required to the flooring in the future, we recommend homeowners have 1 extra carton of material stored in a cool dry area.
- Final inspection of the installation rests with the homeowner or the installer
- **BIYORK CANADA** is not responsible for any damaged or scratched pieces of flooring that have been installed.
- It is the installers responsibility to set aside any material in question during the installation process.
- For further information, please visit www.biyorkcanada.com/pages/resource-library