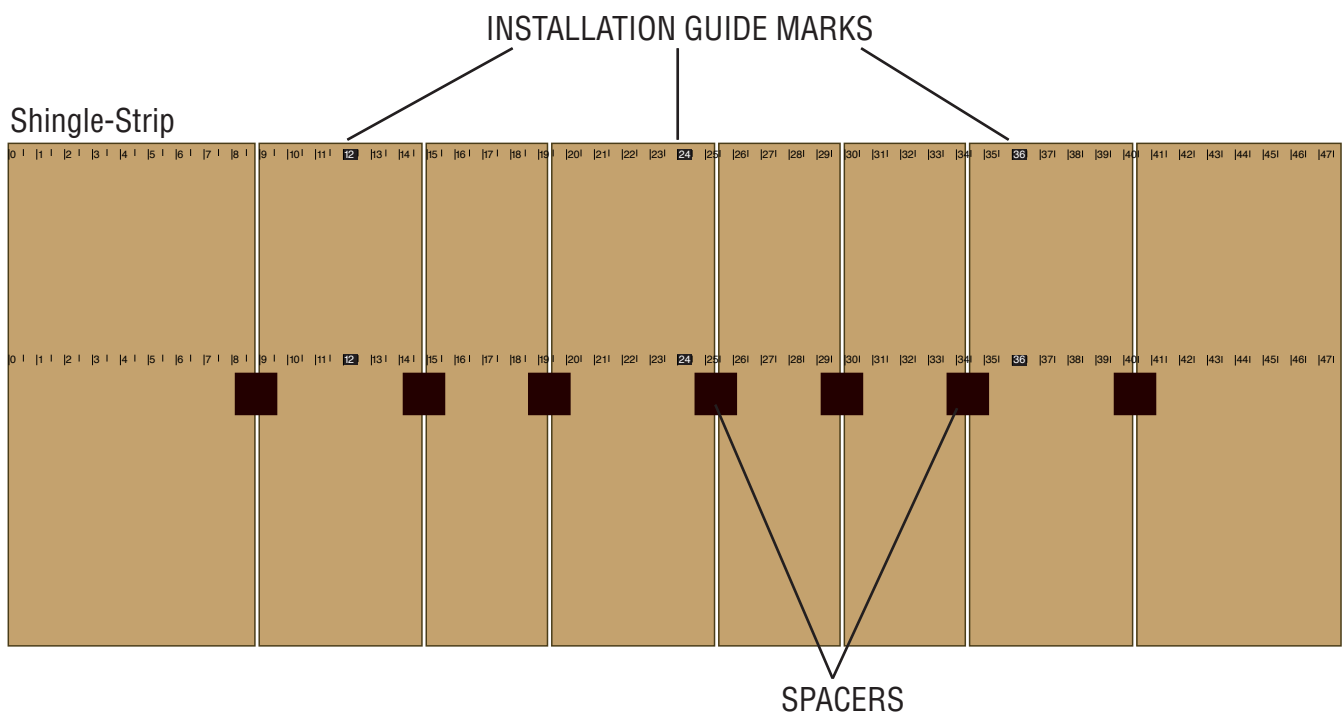


Installation Instructions for Siding V3.2



Basic Information

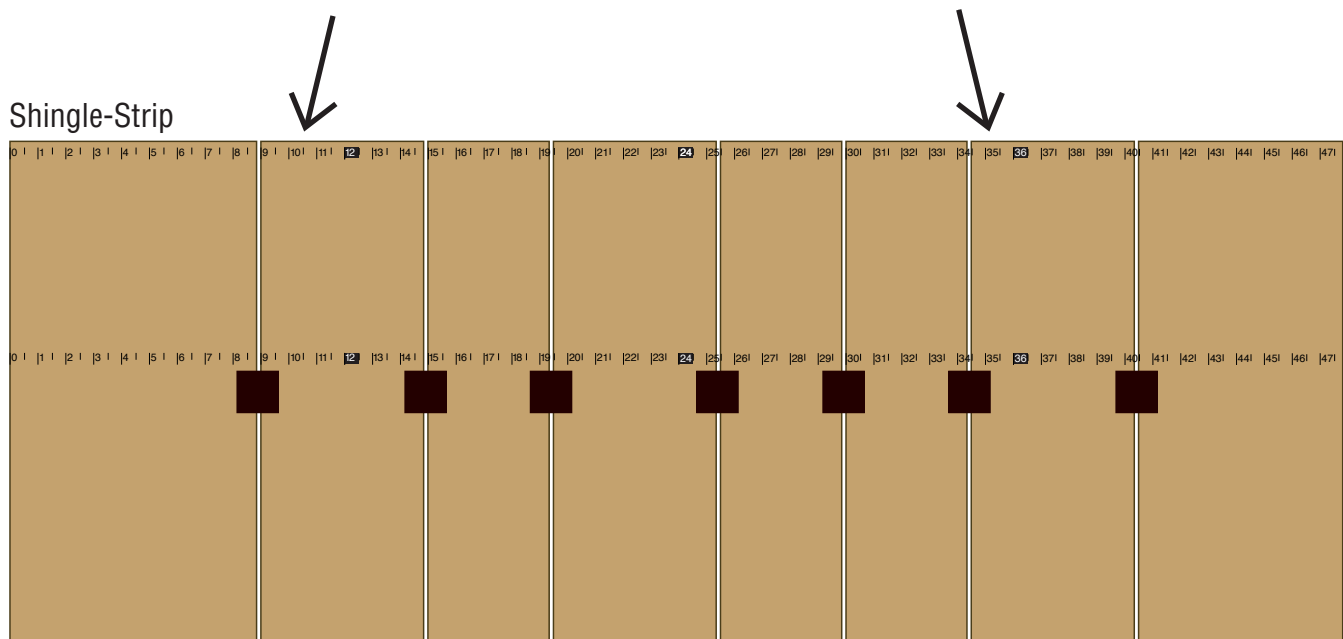
Ecoshel Shingle-Strips come in different configurations that are evenly distributed in the cartons. You don't need to be aware of the different strips. Each strip includes the same three guide marks. Each time you start a new course, you align the edge of the first Shingle-Strip with one of these three guide marks. Starting each new course at one of the guide marks offsets the joints from course to course, and provides a random installation. Review the complete installation instructions below.

Ecoshel cedar shingles are real wood. Minor defects and variations are part of the character of the product. If you damage a Shingle-Strip, set it aside to cut up for detail work or corners, or to be used as a cut strip at the beginning or end of a course.

Ecoshel shingles are kiln dried. The gap between shingles is necessary to allow the shingles to expand when they absorb moisture.

The prefabricated assembly is non-structural. It holds the shingles in position until they are fastened conventionally.

Always pick up and handle Shingle-Strips by holding the top edge.



Sheathing, underlayment, and flashing

Ecoshel Cedar Shingles must be installed on solid sheathing with a minimum thickness of 1/2", or on 1 x ____ spaced sheathing. Plywood, oriented strand board, or solid lumber may be used. The recommended underlayment is 30 pound asphalt impregnated felt. Proper standard flashing must be used above windows, doors and water tables. Contact us if you have specific questions about flashing.

Fasteners

Stainless steel fasteners are essential to avoid black streaks. Stainless ring shank coil siding nails are recommended. Nails should pass completely through the sheathing. Use 4D ring shank nails with a minimum length of 1-1/2" if the exposure is 7" or greater. If the exposure is less than 7", use a 1-3/4" nail. If the underlayment or sheathing is thicker, or if there is rigid foam between the sheathing and the Shingle-Strips, use longer nails as needed to pass through the sheathing. Roofing nails with the oversize head and wider shank should not be used.

Using a coil siding nail gun will provide the fastest installation. Drive nails tight to the surface of the shingle, but don't overdrive. Nail heads should not be buried in the wood fiber. Medium crown staples are approved by code, but will not hold as well as ring shank nails.

Cutting

Ecoshel Shingle-Strips can be separated at the clips by cutting the clips with a sharp utility knife, or by cutting the mesh tape on the back on either side of the clip, and then prying out the clip from the front. Also cut the mesh tape along the top of the Shingle-Strip.

Strips can also be cut with lightweight circular saws, jigsaws, or on a table saw.

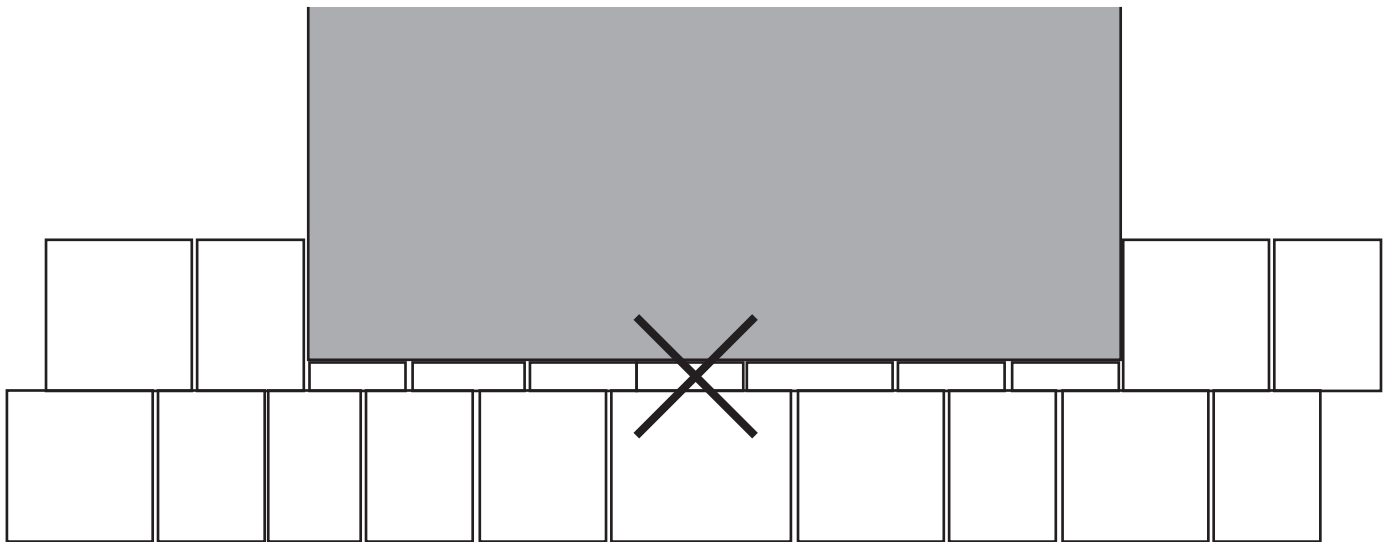
A long saw table with a saw guide is essential to enable the system to be installed precisely and quickly. If you don't have a saw table, you can make one easily with a half sheet of plywood or OSB. See the Saw Table section in these instructions.

Establish a location where shingle-strip cut-offs can be kept until they are needed.

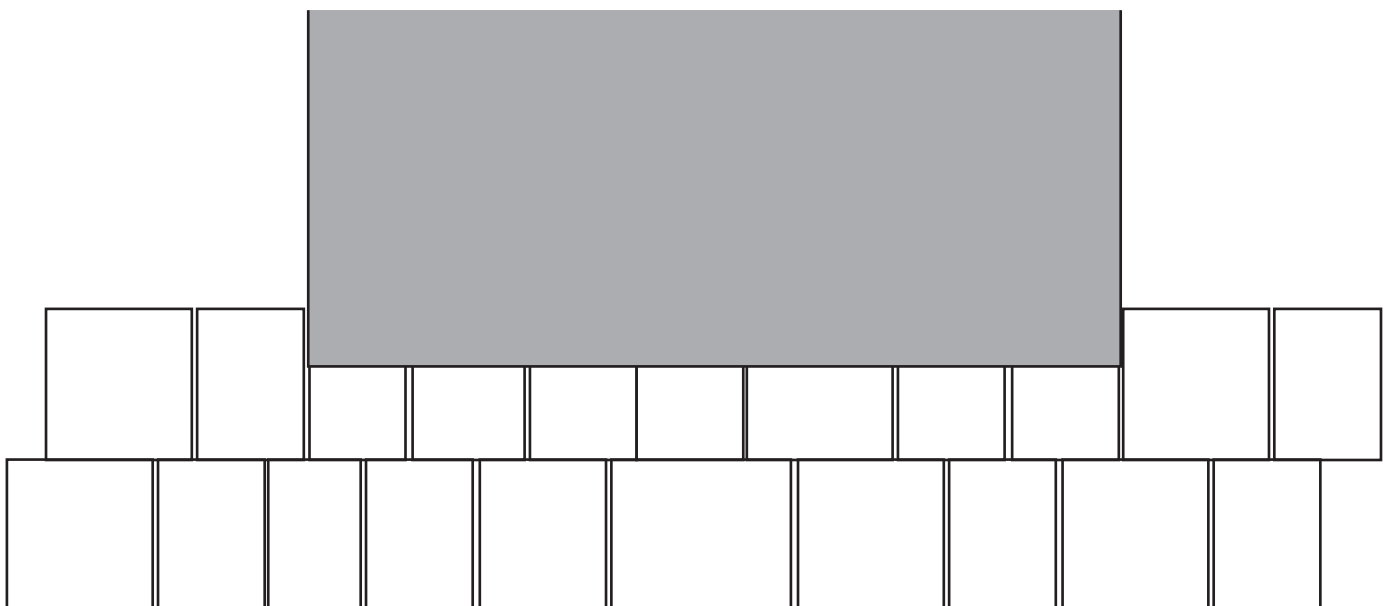
Plan the Installation

Determine the “exposure” you will use (how much of the shingle will be exposed - the height of each course). The maximum recommended exposure for siding is 7-1/2”.

Make adjustments to the exposure to control how each course will align with doors, windows, etc.



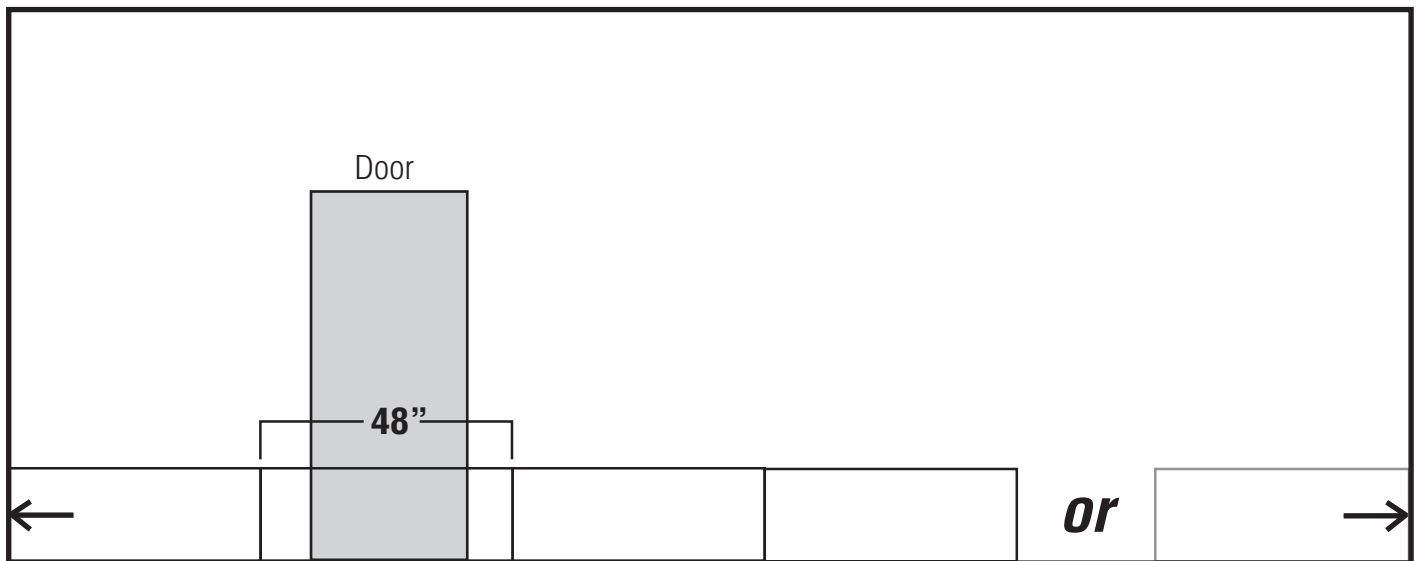
Avoid alignments that require attaching small sections of shingles below windows, or at the top of the wall. Some installers like to align the shingle butts with the trim. We think it looks best to allow an offset as long as it isn't too small. The amount of exposure can be gradually changed to provide better alignment at different horizontal trim points, and at the top of the wall.



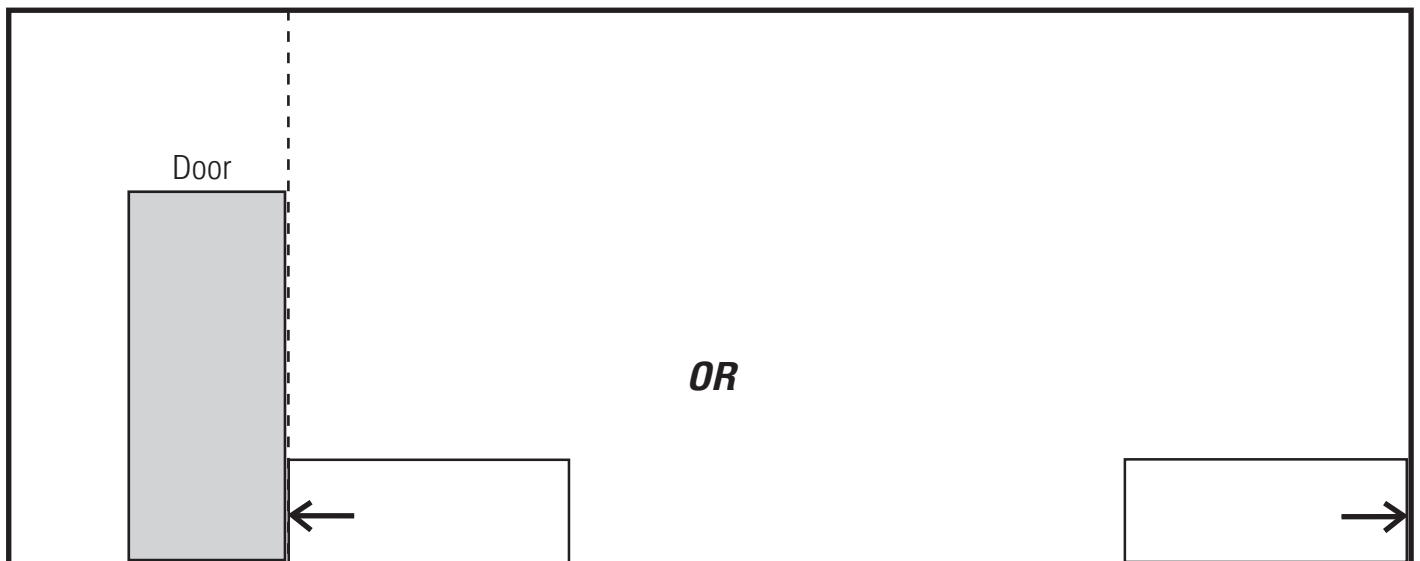
General Instructions

Install The First Course

Install Each Course Maintaining the full Shingle Strip pattern across door and widow openings. Use only one starting point.



For the first course, you can start installing Strips from either corner, or from any convenient point in the middle of the wall. You don't need to start at the corners. With woven corners, it's easier to work to the corners.

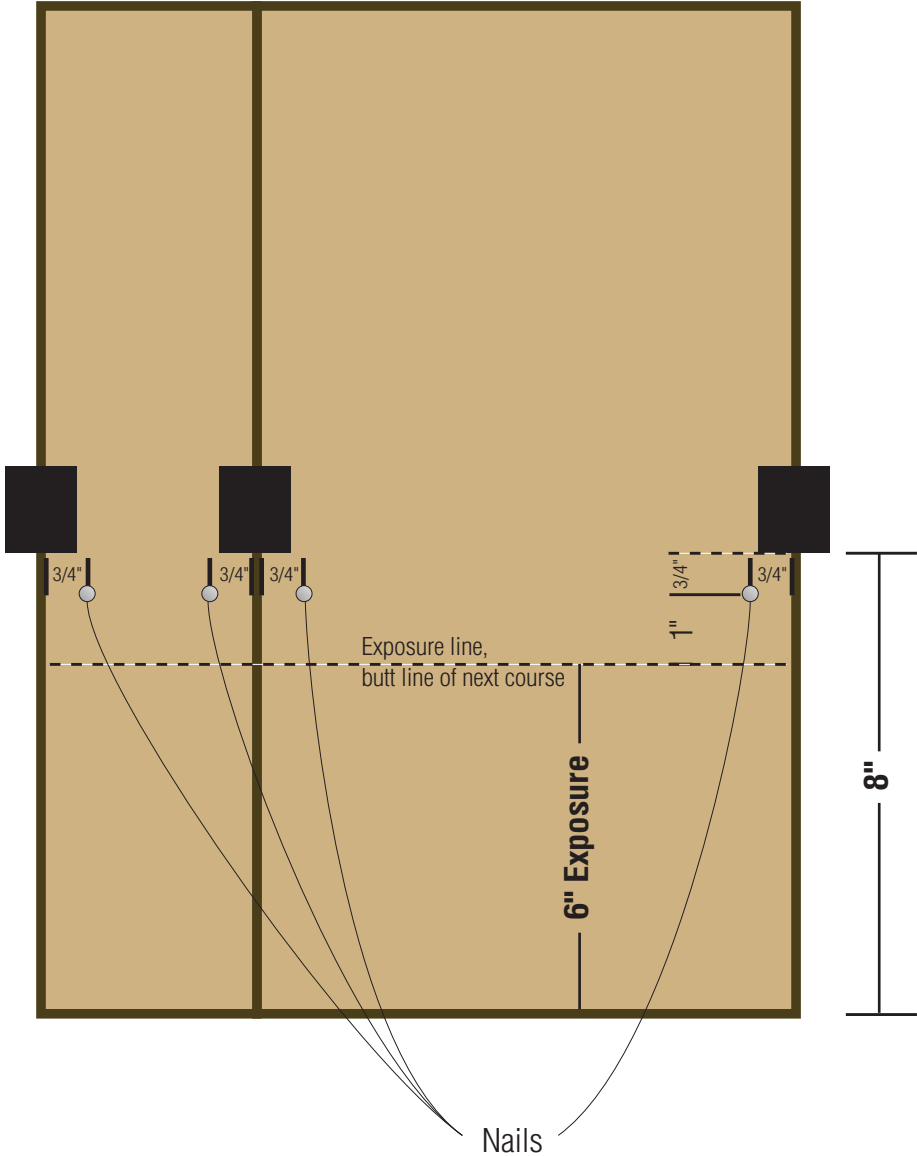


Install the first course allowing a 3/16" gap between Shingle-Strips. Its 48" from any point on one Shingle-Strip to the same point on the next.

Fasten Each Shingle

Fasten each shingle using ONLY two nails per shingle, 3/4" in from each edge, and approximately 1" above the exposure line (the butt line of the next course).

The bottom of the shingle clip is 8" above the butt and can be used as a visual reference for the nail position. The nail head should be near flush to the inside of the clip. The exact position of the nail isn't critical. Try to be within about 1/4 inch of the target.



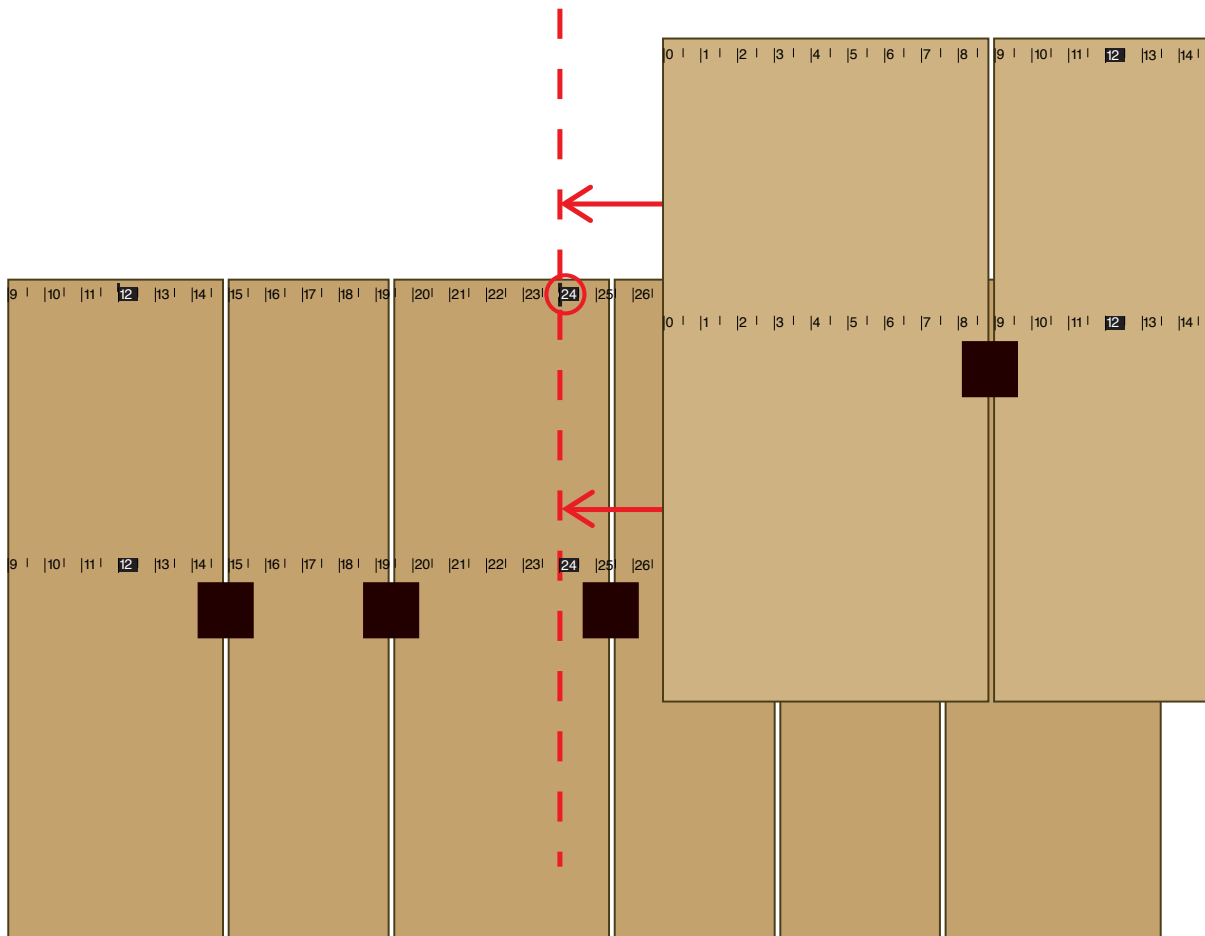
Position and Install the Next Course.

NOTE: THE FIRST COURSE MUST BE DOUBLED. TO DOUBLE THE FIRST COURSE, USE THIS SAME ALIGNMENT PROCEDURE WITH AN EXPOSURE = 0.

Use chalk lines as your guide to position each course. Ecoshel Shingle-Strips are trimmed to 17-1/2". Snap a chalk line on the felt paper above the top edge of the first course, at a distance equal to the desired exposure. Make additional lines at the exposure interval all the way up the wall. You may want to adjust the exposure slightly to control how the courses align with windows, doors, etc. as well as to control the height of the last course.

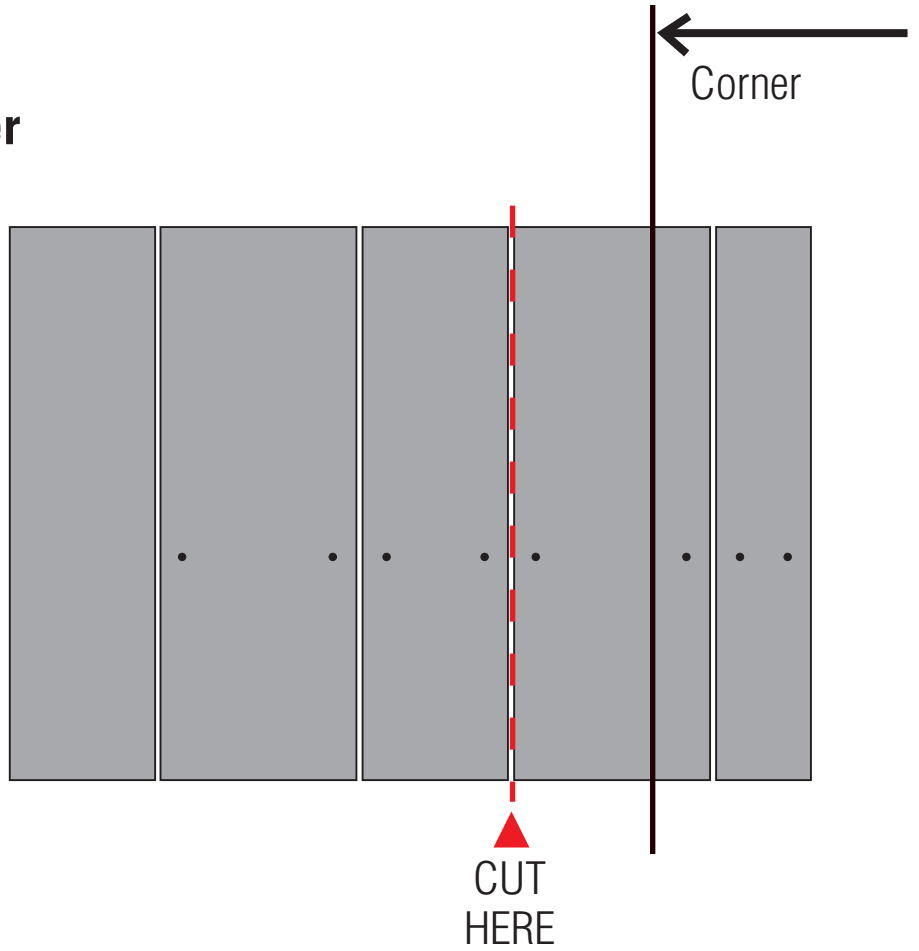
Alignment Procedure: Each time you start a new course, align the left edge of a Shingle-Strip at the 12, 24, or 36" guide mark on the previous course. The edge should align with the left side of the black box. You can install the first strip anywhere in the course. **CHOOSE A GUIDE MARK THAT OFFSETS THE JOINTS FROM THE JOINTS IN THE PREVIOUS TWO COURSES. YOU MUST CHECK TO MAKE SURE YOUR JOINTS ARE OFFSET WHEN YOU INSTALL THE FIRST SHINGLE STRIP OF EACH COURSE. NOT ALL GUIDE MARKS WILL PROVIDE JOINT OFFSETS.**

After the first strip is installed, continue installing full Shingle-Strips to the left and right until the course is complete. You don't need to check the joint offsets after the first strip in the new course is installed. When crossing door and window openings, you can measure across the opening. (It's 48" from any point on a strip to the same point on the next strip), or you can realign again with the previous course using the same guide mark.

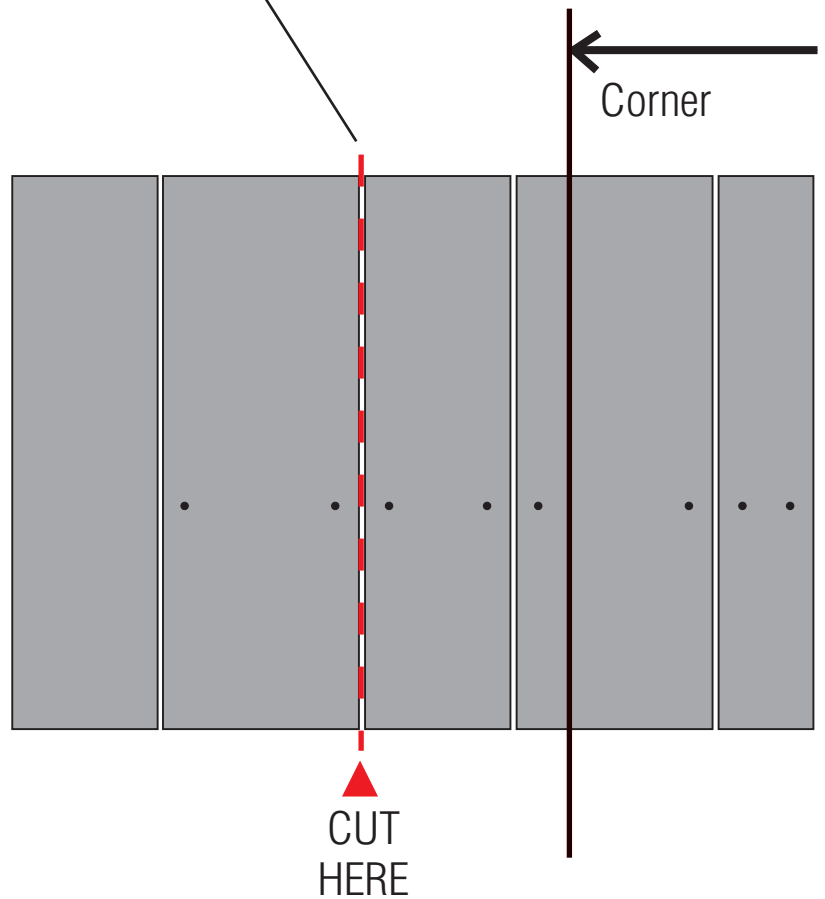


Ending a Course at a Corner

At the end of a course, if you are installing without an assistant, it's easiest to cut the Shingle-Strip at the last joint and install it. Then cut and install the corner shingle using an individual shingle from the cut-off sections.



If the last shingle will be too narrow, cut the shingle-strip at the previous joint, Then use a shingle from scrap strips for the corner.



Corners

Installing Corners with Ecoshel is the same as with conventional shingles. You can use corner boards or form woven or mitered corners. If you are working by yourself, it's easier to install the last Shingle-Strip without the corner shingle, then cut and install the corner shingle separately using shingles from cut-offs. To separate shingles in cut-off sections, cut the two mesh strips on the back at the joint, then fold and twist the shingle to remove it from the clip.

Corners Boards

Installing corner boards is the easiest corner method. Just cut the last shingle to butt up against the corner board. If the last shingle will be less than about 2" wide, you should cut the Shingle-Strip at the previous joint and install a wider shingle. Individual shingles can be separated from cut-offs. Put a bead of caulk on the upper unseen part of the joint between the shingle and the corner board.

Mitered Corners

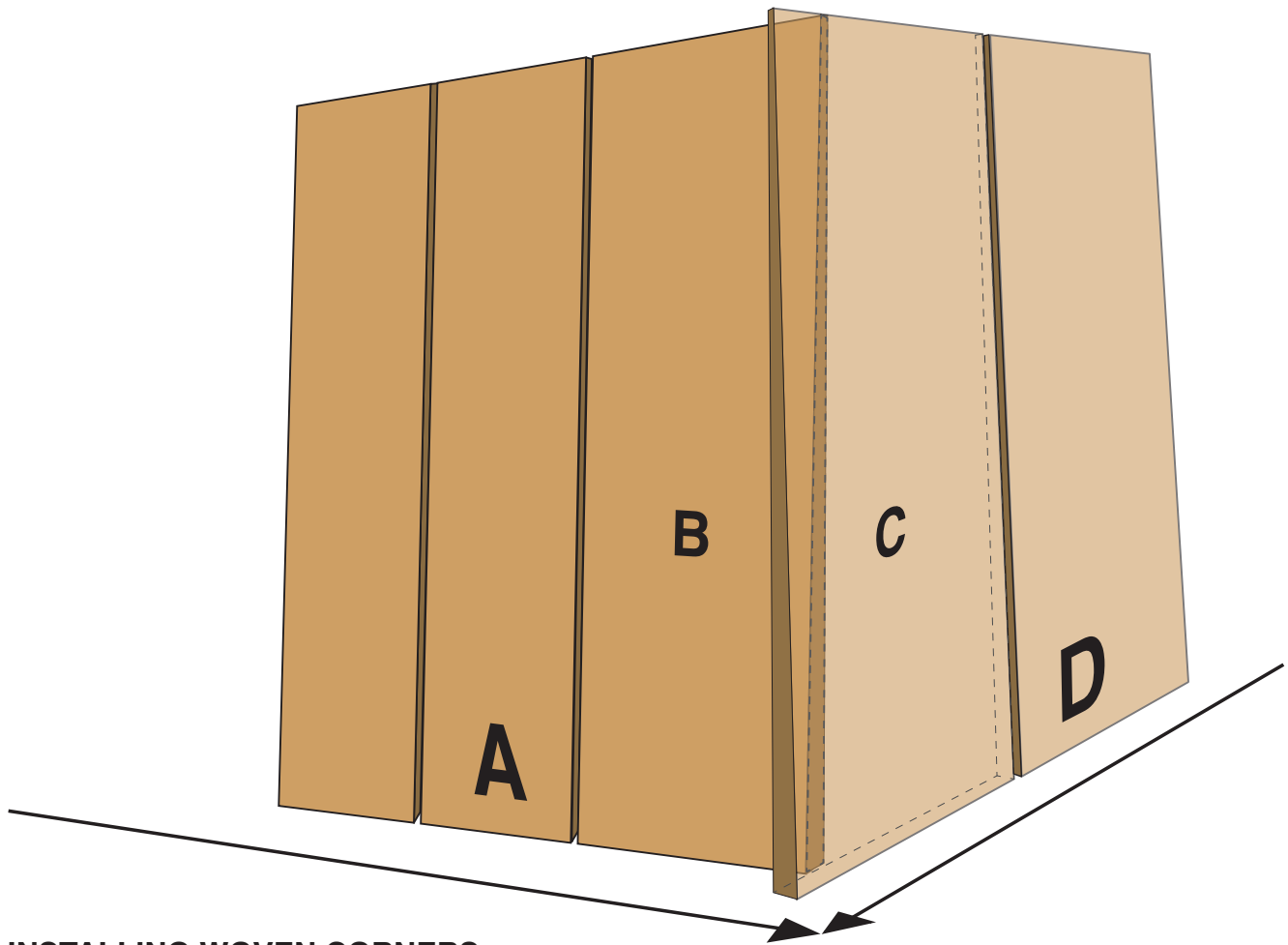
Mitered corners require good carpentry skills and usually require face nailing with stainless steel brads to keep the joints closed. The easiest process is to form the corners using shingles that are wider than needed, then trim the width of the corner shingles allowing the gap with adjacent shingles.

Woven Corners

For woven corners, you alternate the overlap with each course. See the detailed instructions on the next page.



Woven
Corners



INSTALLING WOVEN CORNERS

1. Position Shingle-Strip A with shingle B extending out past the corner.

Trace a line on the back of shingle "B" flush with the surface of the intersecting wall (shingle). Cut shingle B along the line and then install Shingle-Strip A, making sure the corner is flush. The cut line will be curved as it follows the surface of the intersecting shingle, so you will need to cut the shingle with a jigsaw or a knife.

For a perfect corner, cut shingle B a little past the line and install the Shingle-Strip. Then plane the edge flush to the intersecting wall (shingle) using a block plane. You can also cut the corner flush using a portable router with a flush cutting bit. The roller bearing on the router bit rides along the surface of the intersecting shingle.

2. Position Shingle-Strip D with shingle C extending out past the corner.

Trace a line on the back of shingle "C" flush with the surface of shingle "B". Cut shingle C along the line using one of the methods described above.

Continue installing as above, alternating the joint from side to side with each course. If necessary, install a small stainless steel finishing nail near the butt ends to keep the joint tight and flush. Pre-drill a hole for the nail in the top shingle.

Shingles that form the corner should be at least 3" wide. If cutting the Shingle-Strip at the corner will result in a narrower shingle, install an individual (scrap) shingle flush to the corner first, making sure the joint will be offset from the course below, then install the Shingle-Strip up to the corner shingle.

Making a Saw Table

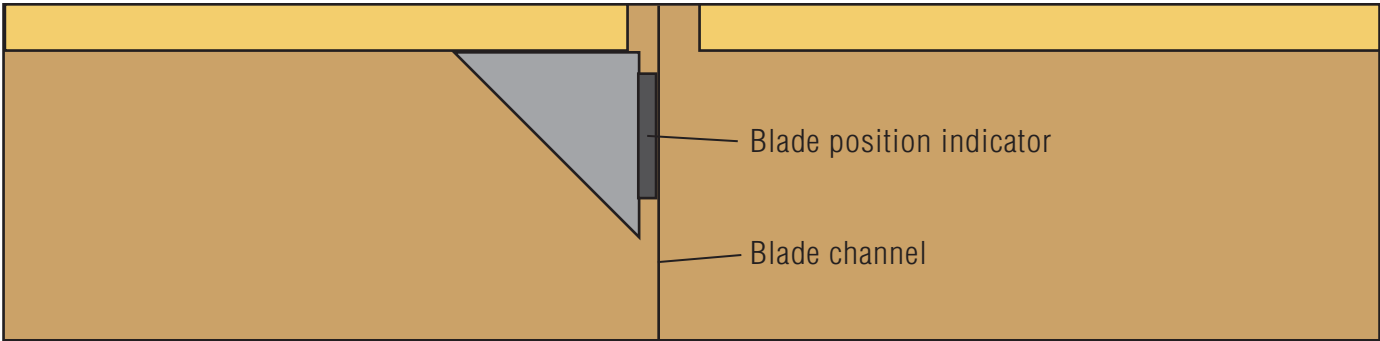
A saw table makes the installation much easier. The easiest way to set up a table is to make a 24" x 96" top with OSB or plywood held straight by a 2 x 4 frame beneath, and then set the frame on saw horses.

A small lightweight battery powered circular saw works well for cutting the shingles.

Install a 1 x 3 strip along the back of the table, with a gap in the strip to allow the circular saw to pass through.

Use a triangle as a saw guide. Tape a thin plastic sheet to the bottom of the triangle and cut it with the saw guided by the triangle. This provides a blade position indicator.

Place the Shingle-Strip on the table with the cut mark above the blade channel. Then place the triangle on the Shingle-Strip with the blade position indicator at the cut mark.

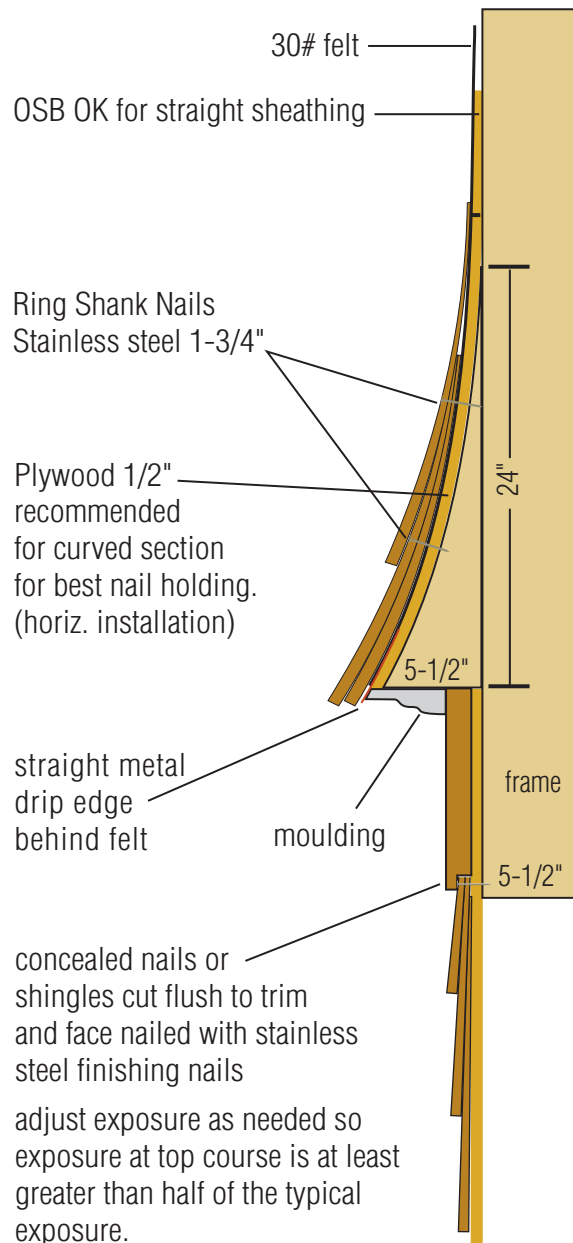


Flared Wall Installation

To install Ecoshel on flared wall sections, you want to bend the whole panel at the same time.

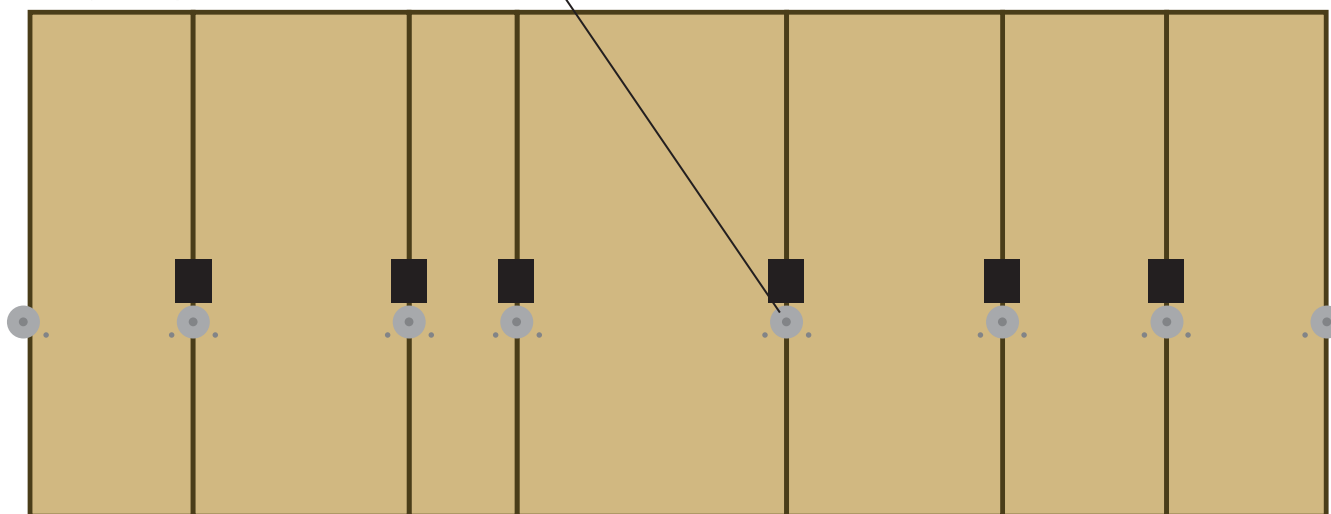
For slight to moderate flare, shoot nails in the normal position, then tap them all in together with a hammer to draw the panel tight to the sheathing. Make sure to keep the gun perpendicular to the shingle so all the nails are at the same angle. Turn the pressure down. You want to just set the nail, and slightly bow the the shingle. Then finish by tapping in all the nails together. You may need to use longer nails than you are using for the rest of the installation.

For more extreme flare, bow the whole panel at the same time by using narrow screws with fender washers in the gaps between the shingles. See the illustration below. Then fasten with nails in the normal position and remove the screws.



fender washers with
narrow screws

Shingle Strip



Base of Wall Details

