

Installation Instructions

XTRACTOR VENT®

X18 / X18 XTRA / XLP

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Installation Instructions: Xtractor Vent



Installation Considerations

DO NOT use multiple vent systems such as:

Powered Fans Roof Pots Turbines Gable Vents

If continuous soffit or fascia vents and ridge vents are used, other vent systems should be removed or disconnected and gable vents should be closed. The use of mixed ventilation systems, such as soffit and ridge vents in combination with a power fan could result in reverse airflow that could result in water leakage into the attic.



X18 and X18 Xtra General Installation

Requirements:

- Install on pitches 3/12 to 16/12. See page 4 for pitches greater than 12/12.
- Must be used with an equal or greater amount of soffit vent.
- 2 inch slot required at ridge.
- Must be installed with minimum nail size of 2-1/2 inches.
- If installing on dimensional or architectural shingles on new construction, leave felt underlayment about 6 inches long at roof ridge and fold back under the vent. The vent should be installed on top of the felt over the shingles. If re-roofing, caulk between low areas of shingle and underside of ridge vent.

Step 1:

Cut a slot in plywood along roof ridge 2 inches wide (1 inch on each side, see detail on page 5). If ridge beam is present, cut slot 1 inch wide on each side of ridge beam (see detail on page 6). Allow for a closed area of sheathing 12 inches at both ends of ridge.

Step 2:

Place first piece of vent with female end 1 inch in from gable end and use centering line for proper alignment along peak. Fasten using at least two nails at each end and in middle of section in nail line area using pre drilled nail holes (2 1/2 inch minimum nail length). More may be required on steeper slopes to seat properly. Continue installing additional pieces along ridge sliding female end over male end, aligning using centering line.

NOTE: In cold weather, allow a 1/8 inch gap between vent sections for expansion.

Step 3:

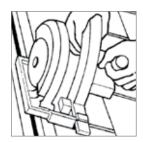
When reaching the other end, the last vent section may need to be cut to length. End plugs are provided every 12 inches on underside of the product. Measure amount needed to install to within 1inch of gable end. Cut that length in from end of vent section and flip around so that end plug is at gable end. Allow male tab from previous piece to slide under last piece and nail in place.

Step 4:

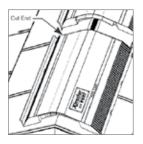
Place first cap shingle over vent so that it overhangs at least 1 inch over end of vent section. Install with 2 1/2 inch nails in nail line area as you work your way down the roof. Cut last cap shingle so that it overhangs vent 1 inch at other gable end.

Helpful hints:

- Optionally, you may install cap shingles on each piece as you go along, taking care to assure proper placement.
- Lines across top of product indicate where the end plugs are on the underside (every 12 inches). There is no need to flip the last piece if you measure and plan ahead to install on an even foot increment.
- The nail line area is completely free from obstructions except where the end plugs are. By using the end plug indicators on top of product, you can easily avoid nails through the end plugs.











XLP General Installation

Requirements:

- Install on pitches 3/12 to 16/12. See page 4 for pitches greater than 12/12.
- Must be used with an equal or greater amount of soffit vent.
- 1-1/2 inch slot required at ridge.
- Can be installed with a nail gun. Compressor pressure should be between 90 and 100 psi.
- Must be installed with minimum nail size of 1-3/4 inches.
- If installing on dimensional or architectural shingles on new construction, leave felt underlayment about 6 inches long at roof ridge and fold back under the vent. The vent should be installed on top of the felt over the shingles. If re-roofing, caulk between low areas of shingle and underside of ridge vent.

Step 1:

Cut a slot in plywood along roof ridge 1 1/2 inches wide (3/4 inch on each side, see detail on page 5). If ridge beam is present, cut slot 3/4 inch wide on each side of ridge beam (see detail on page 6). Allow for a closed area of sheathing 12 inches at both ends of ridge.

Step 2:

Place first piece of vent with female end 1 inch in from gable end and use centering line for proper alignment along peak. Fasten using at least two nails at each end and in middle of section in nail line area (1 3/4 inch minimum nail length). More may be required on steeper slopes to seat properly. Continue installing additional pieces along ridge sliding female end over male end, aligning using centering line.

NOTE: In cold weather, allow a 1/8 inch gap between vent sections for expansion.

Step 3:

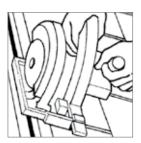
When reaching the other end, the last vent section may need to be cut to length. End plugs are provided every 12 inches on underside of the product. Measure amount needed to install to within 1inch of gable end. Cut that length in from end of vent section and flip around so that end plug is at gable end. Allow male tab from previous piece to slide under last piece and nail in place.

Step 4:

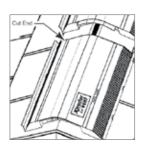
Place first cap shingle over vent so that it overhangs at least 1 inch over end of vent section. Install with 2 1/2 inch nails in nail line area as you work your way down the roof. Cut last cap shingle so that it overhangs vent 1 inch at other gable end.

Helpful hints:

- Optionally, you may install cap shingles on each piece as you go along, taking care to assure proper placement.
- Lines across top of product indicate where the end plugs are on the underside (every 12 inches). There is no need to flip the last piece if you measure and plan ahead to install on an even foot increment.
- The nail line area is completely free from obstructions except where the end plugs are. By using the end plug indicators on top of product, you can easily avoid nails through the end plugs.











Steep Pitch Guidelines (X18, X18 Xtra, XLP)

As a roof's pitch becomes steeper, the effective opening of the slot becomes smaller. To provide effective ventilation, the sheathing cut must be wider than normal.

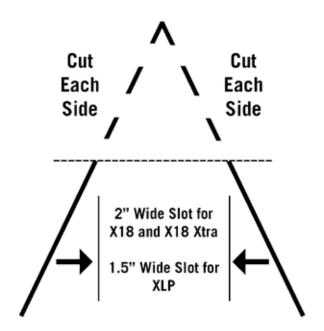
CAUTION: on steep pitch roof conditions verify proper clearance from edge of sheathing prior to nailing.

The following chart gives the necessary measurements for steeper than 12/12 pitches:

PITCH	EACH SIDE (X18, X18 Xtra)	EACH SIDE (XLP)
13/12	1 7/16 in *(2 7/8 in total)	1 1/8 in *(2 1/4 in total)
14/12	1 1/2 in *(3 in total)	1 3/16 in *(2 3/8 in total)
15/12	1 5/8 in *(3 1/4 in total)	1 1/4 in *(2 1/2 in total)
16/12	1 11/16 in *(3 3/8 in total)	1 1/4 in *(2 1/2 in total)

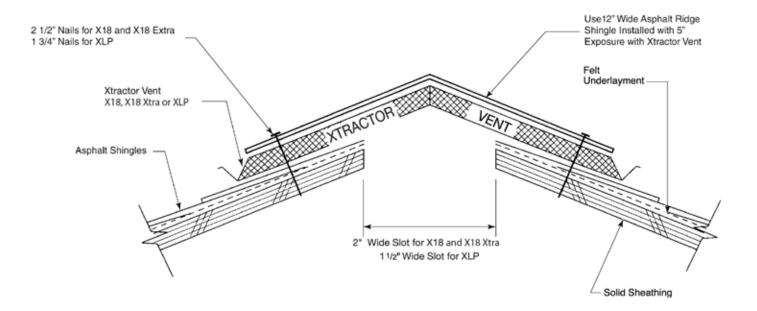
Under no circumstances should Xtractor Vent Ridge Vent be installed on pitches greater than 16/12. This steep pitch application is for ridge installations only.

The presence of a ridge beam may slightly reduce ventilation.





Asphalt Shingles Detail (X18, X18 Xtra, XLP)

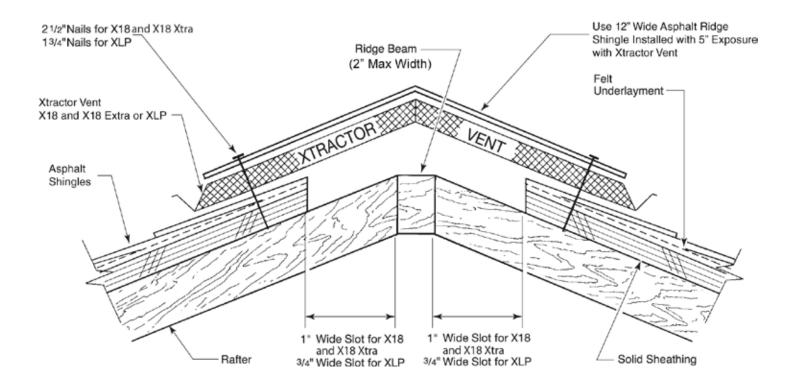


Installation Note:

Use instructions on page 2 (X18 and X18 Xtra) and page 3 (XLP) for asphalt shingle installation.

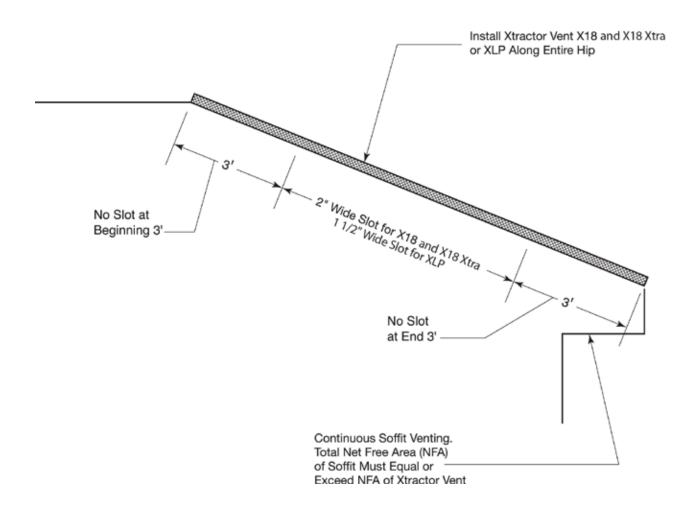


Ridge Beam Detail (X18, X18 Xtra, XLP)





Hip Roof Detail (X18, X18 Xtra, XLP)



Installation Notes:

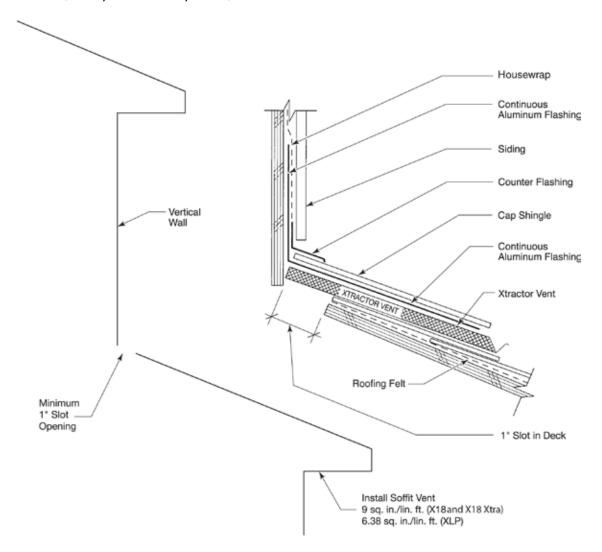
Hip Application not to exceed 12/12 pitch.

Cut slot in roof along hip, 2 inches wide for X18 and X18 Xtra or 1 1/2 inches wide for XLP beginning 3 feet from peak and running to 3 feet of end of hip. Start Xtractor Vent a minimum of 1 inch from each end of the hip. Center cap shingles over vent and use nail line as a placement guide. Install with 2 1/2 inch nails for X18 and X18 Xtra or 1 3/4 inch nails for XLP. Nails must penetrate into the sheathing 3/4 inch or completely through the sheathing. Cap shingles must overhang Xtractor Vent by 1 inch each hip end.

Run bead of sealant along bottom edge of Xtractor Vent where it meets shingles on roof deck.



Shed Roof Detail (X18, X18 Xtra, XLP)



Installation Notes:

Xtractor Vent will only vent 9 sq. in. per linear foot (X18 and X18 Xtra) or 6.38 sq. in. per linear foot (XLP) in this application. The Venturi effect will be limited.

Cut Xtractor Vent baffle area off and install flat side against the vertical wall. Start Xtractor Vent a minimum of 1inch from each end of roof. Center cap shingles over vent and install with nails. Use nail line as placement guide. Nails must penetrate into the sheathing 3/4 inch or completely through the sheathing.

Cap shingles must overhang Xtractor Vent by 1inch minimum at each end of roof.

For added weather protection, install counter flashing behind siding and over top of cap shingle.



Cathedral Ceilings (X18, X18 Xtra, XLP)

Cathedral or vaulted ceilings present some unique ventilating situations that need to be addressed up front to avoid condensation problems down the road. A cathedral ceiling is typically constructed utilizing 2 x 8 rafters on 16 inch or 24 inch centers; plywood roof decking on top of the rafters; and drywall, which becomes the ceiling of the room below, on the bottom of the rafters. Since this rafter space becomes the only separation between living space and outside temperatures, many builders want to install as much insulation as possible in this space. This causes a problem by restricting the air flow capability from soffit (intake) to ridge (exhaust) within these rafter spaces. This usually shows up in the form of condensation. The following are tips to follow when designing or installing Xtractor Vent for use in cathedral/vaulted ceilings:

- 1. Be sure to properly "balance" the Xtractor Vent total net free area with soffit vent total net free area. Strip soffit vent with a net free area of at least 9 sq. in. per linear foot (X18 and X18 Xtra) or 6.38 sq. in. per linear foot (XLP) is necessary.
- **2.** Install Xtractor Vent and soffit venting continuously along the ridge and eave overhang, respectively. Each rafter space must have air flow.
- **3.** Install "vent chutes" between the rafters from the soffit to the ridge. This assures at least 1 1/2 inches of unobstructed air space between the bottom of the deck and top of the insulation.
- **4.** Install a vapor barrier on the "warm" side of the insulation to provide a block against living area moisture migrating into the rafter spaces. Following the above procedures will minimize the potential for condensation-related problems in cathedral or vaulted ceilings.