Glossary of Roofing Terms for the Consumer

Α

Algae - Rooftop fungus that can leave dark stains on roofing.

Algae Discoloration - A type of roof discoloration caused by algae; commonly called fungus growth.

Aluminum – A non-rusting metal used in roofing for metal roofing and the fabrication of gutter and flashing.

Angled Fasteners – Roofing nails and staples driven into decks at angles not parallel to the deck.

APA – American Plywood Association - tests and sets standards for all varieties of plywood used in the United States.

Apron Flashing – Metal flashing used at chimney fronts.

Asphalt – A bituminous waterproofing agent used in various types of roofing materials.

Asphalt Concrete Primer – Asphalt based primer used to prepare concrete and metal for asphalt sealant.

Asphalt Plastic Cement – Asphalt based sealant material, meeting ASTM D4586 Type I or II. Used to seal and adhere roofing materials. Also called mastic, blackjack, roof tar and bull.

ASTM – The American Society of Testing and Materials – a voluntary organization that sets standards for a wide variety of materials, including roofing.

В

Back-surfacing – Granular material added to shingle's back to assist in keeping separate during delivery and storage.

Ballast – A material installed over the top of a roof membrane to help hold it in place. Ballasts are loose laid and can consist of aggregate, or concrete pavers.

Base Ply - The primary ply of roofing material in a roof system.

Base Sheet - An asphalt-impregnated, or coated felt used as the first ply in some built-up and modified bitumen roof systems.

Blistering – Bubbles in roofing materials. Usually moisture related. In shingles blisters are either moisture under the material or moisture trapped inside the material.

Blow-offs – When shingles are subjected to high winds, and are forced off a roof deck.

Buckling - When a wrinkle or ripple affects shingles or their underlayments.

Built-up Roofs (BUR) - A flat or low-sloped roof consisting or multiple layers of asphalt and ply sheets.

Bundle – A package of shingles – there are 3, 4, and 5 bundles per square.

Butt Edge – The lower edge of the shingle tabs.

С

Cant Strip – A triangular-shaped strip of material used to ease the transition from a horizontal plane to a vertical plane. Cant strips can be made of wood, wood fiber, perlite or other materials.

Cap Sheet - A granule-surfaced membrane often used as the top ply of BUR or modified roof systems.

Caulk – To fill a joint with mastic or asphalt cement to prevent leaks.

Cement - See asphalt plastic cement.

Chalk Line - A line made on the roof by snapping a taunt string or cord dusted with chalk. Used for alignment purposes.

Class "A" – The highest fire-resistance rating for roofing as per ASTM E-108. Indicated roofing is able to withstand severe exposure to fire originating from sources outside the building.

Class "B" – Fire-resistance rating that indicates roofing materials are able to withstand moderate exposure to fire originating from sources outside the building.

Class "C" – Fire-resistance rating that indicates roofing materials are able to withstand light exposure to fire originating from sources outside the building.

Closed-Cut-Valley – A shingle valley installation method where one roof plane's shingles completely cover the others. The top layer is cut to match the valley lines.

Coating – A layer of viscous asphalt applied to the base material into which granules or other surfacing is embedded.

Collar - Pre-formed flange placed over a vent pipe to seal the roof around the vent pipe opening - also called a vent sleeve.

Concealed Nail Method – Application of roll roofing in which all nails are driven into the underlying course of roofing and covered by a cemented, overlapping course. Nails are not exposed to the weather.

Condensation – The change of water from vapor to liquid when warm, moisture-laden air comes in contact with a cold surface.

Coping – The piece of material used to cover the top of a wall and protect it from the elements. It can be constructed from metal, masonry or stone.

Copper – A reddish-brown element that conducts head and electricity very well. It is also used as a primary roof material as well as a flashing component. Copper turns a greenish color after being exposed to the weather for a length of time.

Corrosion – When rust, rot or age negatively affect roofing metals.

Counter-Flashing - The metal or siding material that is installed over rooftop base flashing systems.

Course - A row of shingles or roll roofing running the length of the roof.

Coverage – Amount of weather protection provided by the roofing material. Depends on number of layers of material between the exposed surface of the roofing and the deck (i.e. – single coverage, double cover, etc.).

Crickets – A peaked water diverter installed behind chimneys and other large roof projections. Effectively diverts water around projections.

Cupola - A relatively small roofed structure set on the ridge of a main roof area - also known as a Crow's Nest.

Cupping – When shingles are improperly installed over an existing roof or are over-exposed, they form a curl or cup.

Curb – A raised member used to support skylights, HVAC units, exhaust fans, hatches or other pieces of mechanical equipment above the level of the roof surface, and should be a minimum of eight inches in height.

Cutout - The open portions of a strip shingle between the tabs.

D

Deck – The substrate over which roofing is applied. Usually plywood, wood boards, or planks.

Dormer – A raised roof extending out of a larger roof plane.

Double Coverage – Application of asphalt roofing such that the lapped portion is at least two inches wider than the exposed portion, resulting in two layers of roofing material over the deck.

Downspout - A pipe for draining water from roof gutters - also called a leader.

Drip Edge – An installed lip that keeps shingles up off of the deck at edges, and extends shingles out over eaves and gutters, and prevents water from backing up under shingles.

Dry-In – The process of installing the underlayment in steep slope roofing; making a low-slope roof watertight.

Dry Rot – Wood rot caused by certain fungi. Dry rot can result from condensation build-up, roof leaks that go untended, or from other problems. Dry rot will not remain localized. It can spread and damage any lumber touching the affected area.

Ε

Eaves – The roof edge from the fascia to the structure's outside wall. In general terms, the first three feet across a roof is termed the eave.

Eaves Flashing – Additional layer of roofing material applied at the eaves to help prevent damage from water backup.

Edging Strips – Boards nailed along eaves and rakes after cutting back existing wood shingles to provide secure edges for reproofing with asphalt shingles.

Elastomer - A material which, after being stretched, will return to its original shape.

End Laps – When installing rolled products in roofing, the area where a roll ends on a roof, and is overlapped by the next section of rolled material. (i.e. – underlayments, rolled roofing)

Exposure - The area on any roofing material that is left exposed to the elements.

Exposure Nail Method – Application of roll roofing in which all nails are driven into the cemented, overlapping course of roofing. Nails are exposed to the weather.

Exposure I Grade Plywood – Type of plywood approved by the American Plywood Association for exterior use.

F

Fascia – Vertical roof trim located along the perimeter of a building, usually below the roof level.

Fasteners – Nails or staples used in securing roofing to the deck. Felt-organic or paper-based rolled material saturated with asphalt to serve as roofing underlayment.

Felt - Fibrous material saturated with asphalt and used as an underlayment or sheathing paper.

FHA – The Federal Housing Authority – sets construction standards throughout the United States.

Fiberglass Mat - Fibers condensed into strong, resilient mats for use in roofing materials.

Field – Refers to the central part of a roof away from the perimeter.

Flange - Metal pan extending up and down a roof slope around flashing pieces. Usually at chimneys and plumbing vents.

Flashing – Materials used to waterproof a roof around any projections through the roof deck. Pieces of metal or roll roofing used to prevent seepage of water into a building around any intersection or projection in a roof such as vent pipes, chimneys, adjoining walls, dormers and valleys. Galvanized metal flashing should be a minimum 26-gauge.

Flashing Cement - Sealant designed for use around flashing areas, typically thicker than plastic cement.

FM – Factory Mutual Research Corp.

Free-tab Shingles – Shingles that do not contain factory-applied strips or spots of self-sealing adhesive.

G

Gable – The upper portion of a sidewall that comes to a triangular point at the ridge of a slopping roof.

Gable Roof – Traditional roof style – two-peaked roof planes meeting at a ridgeline of equal size.

Galvalume – Trade name for a protective coating composed of aluminum zinc.

Galvanize - To coat with zinc.

Gambrel Roof – A type of roof containing two sloping planes of different pitch on each side of the ridge. The lower plane has a steeper slope than the upper and contains a gable at each end.

Granules - Crushed rock that is coated with a ceramic coating and fired, used as top surface on shingles.

Gutter - The trough that channels water from the eaves to the downspouts.

Н

Hand-sealing – The method to assure sealing of shingles on very steep slopes, in high wind areas, when installing in cold weather.

Head Lap – Shortest distance from the butt edge of an overlapping shingle to the upper edge of a shingle in the second course below. The triple coverage portion of the top lap of strip shingles.

HEX Shingles - Shingles that have the appearance of a hexagon after installation.

High Nailing - When shingles are nailed or fastened above the manufacturer's specified nail location.

Hip - The inclined external angle formed by the intersection of two sloping roof planes. Runs from the ridge to the eaves.

Hip Legs - The down-slope ridges on hip roofs.

Hip Roof – A roof with four roof planes coming together at a peak and four separate hip legs.

Hip Shingles – Shingles used to cover the inclined external angle formed by the intersection of two sloping roof planes.

I

Infrared Thermography - The use of an infrared camera to detect moisture in roof insulation.

Insulation – Material used to help maintain a certain temperature in a building by reducing the flow of heat to and from that building.

Interlocking Shingles - Individual shingles that mechanically fasten to each other to provide wind resistance.

L

"L" Flashing – Continuous metal flashing consisting of several feet of metal, used at horizontal walls, bent to resemble an "L".

Laminated Shingles – Shingles made from two separate pieces that are laminated together – also called dimensional or architectural shingles.

Laps – The area where roll roofing or rolled underlayments overlap one another during application (also see side laps and end laps).

Lap Cement - An asphalt-based cement used to adhere overlapping plies of roll roofing.

Low Slopes – Roof pitches less than 4/12 are considered low-sloped roofs. Special installation practices must be used on roofs sloped 2/12-4/12.

Μ

Mansard Roof - A roof design with a nearly vertical roof plane that ties into a roof plane of less-slope at its peak.

Masonry Primer - An asphalt-based primer used to prepare masonry surfaces for bonding with other asphalt products.

Mastic - See asphalt plastic cement.

Mats - The general term for the base material of shingles and certain rolled products.

Membrane – The portion of the roofing system that serves as the waterproofing material. Can be composed of one material or several materials laminated together.

Mildew - A superficial coating or discoloration of organic materials caused by fungi, especially under damp conditions.

Mineral-surfaced Roofing – Asphalt shingles and roll roofing that are covered with granules.

Modified Bitumen - Rolled roofing membrane with polymer modified asphalt and either polyester or fiberglass reinforcement.

Mopping - To apply hot asphalt or coat tar using a hand mop or mechanical applicator.

Mortar – Mixture of sand, mortar, limestone and water used in bonding a chimney's bricks together.

Ν

Nail Guide Line - Painted line on laminated shingles, to aid in the proper placement of fasteners.

Nail Pop - When a nail is not fully driven, it sits up off the roof deck.

Nesting - Installing a second layer of shingles aligning courses with the original roof to avoid shingle cupping.

No-cutout Shingles – Shingles consisting of a single, solid tab with no cutouts.

0

Open Valley – Valley installation using metal down the valley center.

Organic Mat (Felt) - Material made from recycled wood pulp and paper.

Organic Shingles - Shingles made from organic (paper) mats.

OSB – Oriented Strand Board – a decking made from wood chips and lamination glues.

Over Driven – The term used for fasteners driven through roofing material with too much force, breaking the material.

Over Exposed – Installing shingle course higher than their intended exposure.

Overhang - That portion of the roof structure that extends beyond the exterior walls of a building.

Ρ

Penetration - Any object that pierces the surface of the roof.

Pitch – Ratio of the rise of the roof, in inches, to the span of the roof, in feet (i.e. -4/12).

Power Vents - Electrically powered fans used to move air from attics and structures.

Plastic Cement – Asphalt based sealant, also called bull, mastic, tar and asphalt cement.

Plumbing Vents - Term used to describe plumbing pipes that project through a roof plane, also called vent stacks.

Ply - The number of layers of roofing (i.e.- one-ply, two-ply).

Ponding - The accumulation of water at low-lying areas on a roof.

Prevailing Wind - The most common direction of wind for a particular region.

Q

Quarter-sized – Term for the size of hand sealant dabs, the size of a U.S. 25¢ piece.

Quick-setting Cement – An asphalt-based cement used to adhere tabs of strip shingles to the course below. Also used to adhere roll roofing laps applied by the concealed nail method.

R

Racking – Roofing application method in which shingle courses are applied vertically up the roof rather than across and up. Not a recommended procedure.

Rafter – The supporting framing member immediately beneath the deck, sloping from the ridge to the wall plate.

Rake Edge - The vertical edge of gable style roof planes.

Release Tape – A plastic or paper strip that is applied to the back of self-sealing shingles. This strip prevents the shingles from sticking together in the bundles, and need not be removed for application.

Ridge - The uppermost, horizontal external angle formed by the intersection of two sloping roof planes.

Ridge Vent - Hard plastic ridge vent materials.

Rise - The vertical distance from the eaves line to the ridge.

Roll Roofing - Asphalt roofing products manufactured in roll form.

Roof Louvers - Rooftop rectangular shaped roof vents, also called box vents, mushroom vents, air hawks and soldier vents.

Roof Plane - A roofing area defined by having four separate edges, one side of a gable, hip or mansard roof.

Roofing Tape - An asphalt-saturated tape used with asphalt cements for flashing and patching asphalt roofing.

Run – The horizontal distance from the eaves to a point directly under the ridge – one-half the span.

S

Saturated Felt – An asphalt-impregnated felt used as an underlayment between the deck and the roofing material.

Self-sealant – Sealant installed on shingles. After installation, heat and sun will activate sealant to seal the shingles to each other.

Self-sealing Shingles – Shingles containing factory-applied strips or spots for self-sealing adhesive.

Self-sealing Strip or Spot – Factory-applied adhesive that bonds shingle courses together when exposed to the heat of the sun after application.

Selvage - The non-exposed area on rolled roofing. Area without granules, designed for nail placement and sealant.

Shading - Slight differences in shingle color that may occur as a result of normal manufacturing operations.

Sheathing - Exterior grade boards used as a roof deck material.

Shed Roof - Roof design of a single roof plane. Area does not tie into any other roofs.

Side Laps – The area on rolled material where one roll overlaps the rolled material beneath it. Also called the selvage edge on rolled roofing.

Side Walls - Where a vertical roof plane meet a vertical wall - the sides of dormers, etc.

Single Coverage – Asphalt roofing that provides one layer of roofing material over the deck.

Slope – The degree of roof incline expressed as the ratio of the rise, in inches, to the run, in feet.

Soffit Ventilation - Intake ventilation installed under the eaves, or at the roof edge.

Soil Stack – A vent pipe that penetrates the roof.

Span - The horizontal distance from eaves to eaves.

SPF (Sprayed Polyurethane Foam) Compounds – Refers to the isocyanate and resin components used to make polyurethane foam.

Square - A unit of roof measure covering 100 square feet.

Square-tab Shingles - Shingles on which tabs are all the same size and exposure.

Starter Strip - The first course of roofing installed, usually trimmed from main roof material.

Steep Slope Roofing – Generally all slopes higher than 4/12 are considered steep slopes. A method of installing asphalt shingles on roof slopes greater than 21 inches per foot.

Step Flashing - Metal-flashing pieces installed at sidewalls and chimneys for weatherproofing.

Strip Shingles - Asphalt shingles that are approximately three times as long as they are wide.

Substrate – The surface that the roof is installed upon.

Т

Tab – The bottom portion of traditional shingle separated by the shingle cutouts.

Tear-offs - Removal of existing roofing materials down to the roof deck.

Telegraphing – When shingles reflect the uneven surface beneath them. Shingles installed over buckled shingles may show some buckles.

Three-dimensional Shingles - See laminated shingles.

Three-tab Shingles – The most popular type of asphalt shingle usually 12"x36" in size with three tabs.

Top Lap – That portion of the roofing covered by the succeeding course after installation.

Transitions - When a roof plane ties into another roof plane that has a different pitch or slope.

U

UL - Underwriters Laboratories Inc.

UL Label - Label displayed on packaging to indicate the level of fire and/or wind resistance of asphalt roofing.

Under Drive - Term used to describe a fastener not fully driven flush to the shingles surface.

Underlayments – Asphalt based rolled materials, which are designed to be installed under main roofing material, to serve as added protection.

۷

Valleys - Area where two adjoining sloped roof planes intersect on a roof creating a "V" shaped depression.

Vapor – Term used to describe moisture-laden air.

Vapor Retarder – Any material used to prevent the passage of water vapor.

Veneer - Any of the thin layers of wood glued together to make plywood.

Vent – Any outlet for air that protrudes through the roof deck such as a pipe or stack. Any device installed on the roof, gable or soffit for the purpose of ventilating the underside of the roof deck.

Ventilation - The term used in roofing for the passage of air from an enclosed space.

W

Warm Wall – The finished wall inside of a structure, used in roofing to determine how to install waterproof underlayments at eaves.

Warranty - The written promise to the owner of roofing materials for material related problems.

Waterproof Underlayments – Modified bitumen based roofing underlayments, which are designed to seal wood decks and waterproof critical leak areas.

Weep Holes - Small holes used to permit moisture to drain that has gathered inside a building component.

Wind Clip – A clip that slips over the ends of tile, slate and other steep slope roofing materials in order to help prevent wind uplift damage.

Wind Load - The force that wind puts on structures.

Wind Uplift – The upward displacement of a section of a roof system or component caused by movement of air from a location of higher air pressure, to an area of lower air pressure. Strong wind along the surface of a roof, especially at corners and along perimeters, creates low air pressure above the surface of the roof. Displacement or blow-off of shingles or other roofing caused by the wind.

Woven Valleys - The method of installing valleys by laying one shingle over the other up the valley center.