



5 Steps to a Safer and Stronger Home

Glossary

What is a hurricane tie? Or a structural connector? When working with a builder or remodeler, it will help to know these construction terms. The following glossary provides easy-to-understand explanations that will help you sound like a pro.

General Construction Terms

Anchor Bolt: Anchor bolts are used to secure the mudsill to the foundation. An anchor bolt is a metal rod, usually with a threaded end, that is set in concrete and is embedded in the foundation or post-installed in existing concrete.

Building Codes: Building codes refer to a set of standards or regulations established and enforced by the local government that describe the minimum design and structural requirements for homes and buildings.

(Metal) Connectors: Metal connectors are steel components that connect the frame of the house together. Connectors are used where two framing members meet. They are designed to strengthen a home and increase its ability to resist earthquakes, high winds, hurricanes and other forces.

Continuous Load Path: A continuous load path is a system of construction that provides a method of transferring external or internal forces from the frame of the house to the foundation by ensuring that each framing member is properly connected together.

Crawl Space: Crawl space refers to the space beneath a home, which is typically 18 to 48 inches high and is supported by short wood-framed walls known as cripple walls.

Cripple Walls: Cripple walls are short wood-framed walls between the first floor and foundation that run underneath and around the perimeter of a house. These walls are constructed on top of a home's foundation and are generally 12 to 30 inches high, but as high as 12 feet when located on a hillside.

Fasteners: Fasteners typically refer to nails, screws, bolts or anchors. They are used to join framing members together either by themselves for light-duty connections or in conjunction with connectors for heavier connections.

Foundation: The foundation is the block wall, concrete wall or concrete slab that a house sits on.

Framing or Wood Members: In wood-frame construction, framing members typically refer to structural wood members, such as studs, sill plates, rafters/trusses, and sheathing material.

Holdowns: Holdowns are heavy-duty connectors that anchor the ends of shearwalls to prevent overturning forces.

Hurricane Ties or Clips: Hurricane ties are metal connectors specially manufactured to fasten the roof to the wall framing.

Joists (Floor and Rim Joists): Joists refer to the wood members that make up part of the floor system of a house and support vertical loads. Rim joists run along the perimeter of the floor system.

Load: Load refers to the amount of weight a structure must support or the forces applied to the structure that it must resist.

Mudsill (Wood Sill or Sill Plate): A mudsill is the wood frame that attaches to both the top of the foundation and to the floor system above. It's typically chemically pressure treated to resist potential decay caused by moisture in the foundation.

Mudsill Anchors: Mudsill anchors are connectors that anchor the mudsill and wall framing to the foundation (a builder/remodeler may also use anchor bolts).

OSB/Plywood Sheathing: OSB and plywood sheathing are panels made from wood or fiber materials that are applied to the outer studs, joists, and rafters of a home to strengthen the structure.

Pressure-treated Wood: Pressure-treated wood is lumber that has been treated with chemicals to help preserve the wood and prevent decay.

Rafter/Truss: A rafter or truss is a structural wood member that supports the roof.

Retrofit: A retrofit adds additional bracing, anchoring or any improvement to a home after the structure has been built.

Shearwalls: Shearwalls are reinforced walls within a home that have been engineered to help resist the shear (racking) forces that are caused by high winds or lateral forces that are caused by earthquakes. Shearwalls are typically constructed by attaching wood sheathing and holdown connectors to a section of the wood framing along a wall. Pre-manufactured shearwalls are also available.

Strap Ties: Strap ties are flat metal connectors that tie the upper story to the lower story or anchor down ends of headers or beams.

Structural Integrity: A home's structural integrity refers to its ability to meet the required loads, and resist such forces as earthquakes and high winds.

Studs: Studs are vertical wood members that compose the framework of a wall.

Top Plate/Bottom Plate: Top and bottom plates are horizontal wood members that run along the top and bottom of wall sections.

Ventilation Holes: Ventilation holes are circular holes that are cut into OSB or plywood sheathing to help prevent the wood from decay and rot.

Deck Terms

Beam: A beam is the wood member that spans between two supports, such as posts.

(Metal) Connectors: Connectors are steel components that connect the frame of the deck together. Connectors are used where two wood framing members meet. They are designed to strengthen a deck and increase its ability to resist earthquakes, high winds and other forces.

Continuous Load Path: A continuous load path is a series of solid connections within the structure of the deck that transfers the load through its frame to the ground and the adjacent support structure (typically a home).

Deck Boards: Deck boards make up the floor surface of the deck and are connected to the joists. Decks boards are typically made out of pressure-treated lumber or composite (man-made) materials.

Fasteners: Fasteners typically refer to nails, screws, bolts or anchors. Fasteners are used with connectors to join framing members together.

Footing: A footing is a below-ground support, typically made of concrete, that helps secure the deck's posts.

Joists (Floor and Rim Joists): Joists refer to the horizontal wood members located directly beneath the deck boards that support the floor system of a deck.

Joist Hanger: A joist hanger is a metal connector that secures and supports the floor joists.

Ledger: The ledger is a horizontal board that is attached to the side of a house and helps support one edge of a deck.

Ledger Connection: The ledger connection refers to the connection between the house and the deck.

Post (Column): A post or a column is a load-bearing vertical wood member that supports the beam.

Post Cap: A post cap is a connector that secures a beam to a post.

Railing: A railing is a structure made of rails and vertical members commonly used on decks for support or as a guard or barrier.

Stair Stringer: The stair stringer is the structural member that supports the stair treads or steps. It typically runs along each side of the stair treads.

