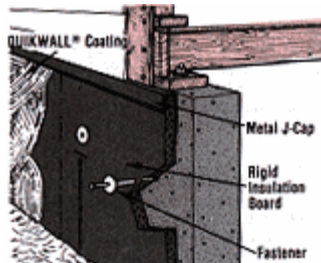


Project

Insulating Foundation Walls

If your house has uninsulated concrete basement walls, you can reduce heat loss substantially by installing rigid insulation covered with QUIKWALL® Fiberglass-Reinforced Stucco or Foam Coating. Panels can be made of extruded polystyrene (white bead board), urethane panels, pressed glass fiberboard, or other rigid insulation materials that have sufficient strength. For certain extruded insulation boards with a film coating present on the board face, it is necessary to remove this coating by stripping off the film. For other extruded boards having a slick surface, you must roughen the surface to insure proper bond. This is accomplished by sanding or scarifying the surface. Insulation panels may be applied to any structurally sound foundation wall.



Ideally, the insulation panels should extend below the frost line. If digging to the frost line level is not practical, the panels should extend a minimum of 6" below ground level.

Required Tools & Materials

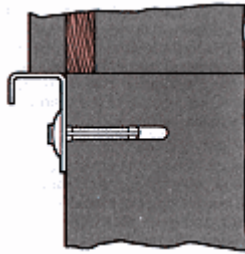
- QUIKWALL® Fiberglass-Reinforced Stucco or Foam Coating
- Rigid insulation panels
- Fiberglass tape
- Fasteners and washers
- Medium heavy paintbrush
- Acrylic latex or silicone caulk
- Caulking gun
- Metal J-channel capping
- Hammer
- Shovel
- Straight edge
- Tape measure
- Saw or utility knife
- Putty knife
- Trowel
- Power drill with mixing paddle

Step by Step

Wall Preparation

To estimate the amount of rigid board needed, measure from the bottom edge of the siding to the below-grade depth and multiply by the perimeter of the house. This will give you the square footage of board needed. To prepare for installation do the following:

1. Dig out the soil from the foundation to the required depth.
2. J-channel or other metal capping must be installed at the bottom edge of the siding and around all windows and doors to protect the exposed edge of the rigid insulation. To install, first apply a bead of caulking to the underside of the bottom edge of the siding.
3. Drill properly sized holes in the channel on 2' centers. The exact size of the hole will depend on the fasteners used to mount the channel.
4. Press the channel into the caulking bead to create a watertight seal behind the J-channel. This prevents water from flowing down behind insulation.

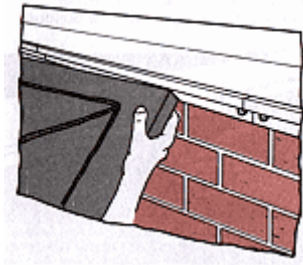


5. Mechanically fasten the channel to the foundation by installing fasteners through the drilled holes.

Installing the Insulation

The rigid board can be secured to the foundation with special concrete fasteners and washer or with panel and foam adhesives specially formulated for use with rigid insulation board.

1. Measure and cut the insulation panel to size using a saw or utility knife. (With certain types of extruded polystyrene boards, the clear plastic coating must be removed prior to installation.) Make certain all panels butt tightly against one another and the J-channel.
2. If securing with fasteners and washers, it is recommended that a small amount of the proper adhesive be used to help hold the panel in place while the mechanical fasteners are being installed. Predrill the proper size holes through the rigid board into the foundation on 24" centers both vertically and horizontally. Holes must be deep enough to accommodate the fasteners and allow the washers to be recessed into the panel. Butt the panels at the corners so one panel overlaps the other.



3. If securing with an adhesive, use only those adhesives designed to be used with rigid foam insulation. Solvent-based construction adhesives will destroy the installation board. Apply the adhesive according to the manufacturer's instructions.

4. Apply self-sticking fiberglass tape to the joints between the insulation panels, to all outside corners, using two or more overlapping pieces as needed, and over all fastener heads and damaged panel areas. Brush dirt and residue from the insulation surface. Note: Foam insulation that has been exposed to sunlight may have a powdery, yellow residue on its surface that must be removed.

5. Mask around channels, windows and doors to prevent contact with the masonry coating.

Applying the Coating

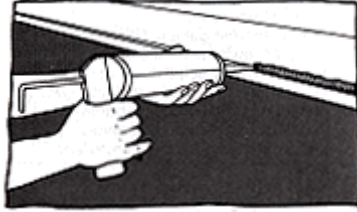
1. Remove the bag of powdered contents from the bucket and place 1 gallon of water into the bucket.

2. Using the mixing padding installed on the power drill, begin mixing the water while adding the powdered material. It may be necessary to add a little more water to obtain the desired final consistency once all the powder has been added.

3. Once all the powder is added, continue mixing for no more than 5 minutes. If the mix begins to stiffen during application, remix, adding a slight amount of water, if needed.

4. Use a putty knife to precoat all taped areas with QUIKWALL® mix.

5. With a trowel, cover the insulation panels to the desired thickness. To prevent extreme color variation, cover the entire wall corner-to-corner in one work session. (Note: A uniform color is not possible with gray portland cement.) Clean the trowel periodically to avoid a buildup of coating. Texture the coating as desired while it is applied. Do not rewet the coating for the purpose of texturing.



6. The final coating thickness should be approximately 1/16", although a thicker coating can be applied if the surface must withstand abuse. The final coat is best applied with a stiff-bristled brush.

Finishing and Curing

1. Remove all masking tape.
2. Replace the dirt from around the foundation, sloping it so that water runs away from the foundation.
3. Caulk around channels, doors, and windows to prevent moisture from penetrating behind the coating.



4. Moist-cure the surface of the coating using a fine mist spray after the surface has set (about 2 hours.) Continue the misting several times daily for a minimum of 2 days.
5. If desired, the coated panels can be brush coated with QUIKRETE® Masonry Coating in a variety of colors. They can also be painted for a dense color finish.