

An engineer's seal is not required for one and two unit dwellings where the backfill is less than 1.2 meters but more than 450mm if the following is provided.

1. Minimum of 300mm (12 inches) of cover over the rigid insulation to protect the rigid insulation from mechanical damage.
2. Minimum of 50mm (2 inches) of rigid insulation with an R value of 4.5R/inch extending out 600mm (2 feet) from the foundation walls along the sides, (dimension A – Figure 1), and
3. Minimum of 75mm (3 inches) of rigid insulation with an R value of 4.5R/inch extending out 750mm (30 inches), (dimension B – Figure 1), at the corners extending along the wall 1.5m (5 feet), (dimension C – Figure 1), from each corner. Alternatively provide 2 layers of 50mm (2 inches) of rigid insulation (600mm wide) with an R value of 4.5R/inch offset to provide insulation coverage for the distances required above.
4. A minimum of 50mm (2 inches) of vertical rigid insulation on the exterior side of a concrete wall above the horizontal insulation. (See Figure 2)
5. The horizontal insulation should slope away from the foundation wall.

Localized depressed areas (maximum of 3 foot by 3 foot landing) for exterior unheated entryways shall have a minimum of 50mm (2 inches) of horizontal and vertical rigid insulation with an R-value of 4.5R/inch under the slab/stair and on the exterior of the adjacent concrete wall respectively. The abutting retaining wall(s) must be insulated up a minimum of 1.2m on either side of the wall to protect the footings from a significant cold joint. The slab must be free floating and not tied to the foundation wall. The foundation wall around the entryway must be supported by piles extended to a minimum of 2.4 meters (8 feet) below the entryway floor level. The foundation wall must be constructed as a grade beam and have a void form directly under it. The entryway must be drained so that water does not accumulate within the entryway or under the slab.

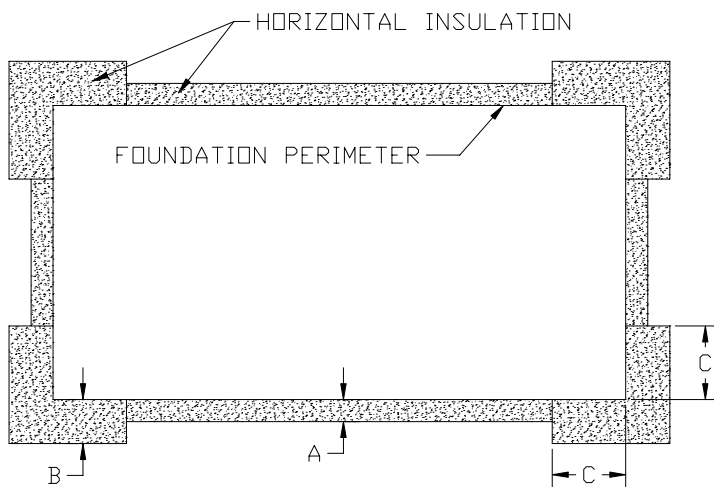


Figure 1

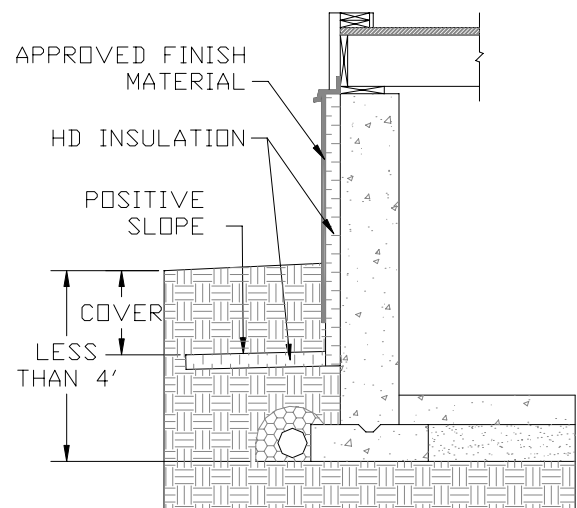


Figure 2