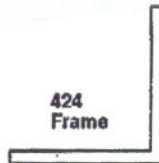


Installation Guide

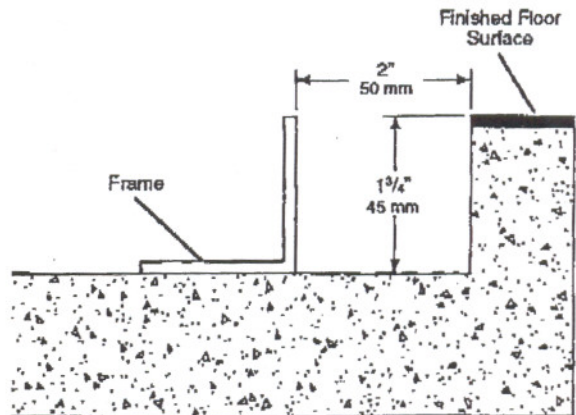
#424 Grate Frames



1. Prepare the floor recess

Prepare a recess in the concrete flooring where the grate will be located. The recess should be at least:

- $1\frac{3}{4}$ " (45 mm) deep
- 4" (100 mm) wider than the outside dimensions of the frame — this allows 2" (50 mm) on all sides to maneuver the frame into position



2. Drill anchor holes

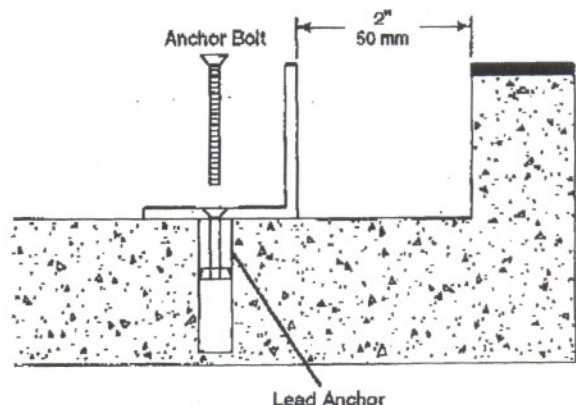
The grate frames should be secured to the concrete floor using anchor bolts into lead anchors that are set into the floor.

Drill holes in the frames at about 2-ft (6-m) intervals for the bolts. Countersink the holes.

Set the frames into the recess at the appropriate locations to position the grate(s). Mark the hole locations on the concrete.

Remove the frames and drill holes in the floor for the anchors.

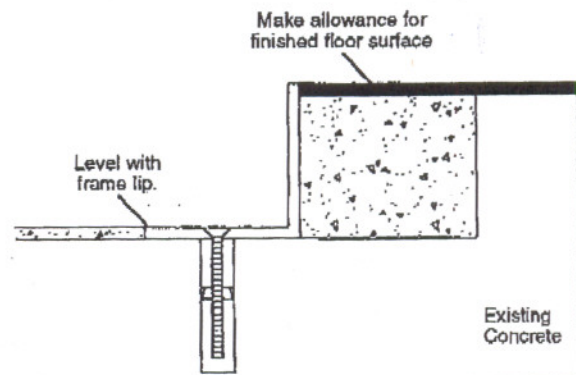
Install the anchors using an anchor setting tool.



3. Secure frames in the recess

Reinstall the frames. Secure them to the floor with $\frac{1}{8}$ " x $1\frac{1}{2}$ " anchor bolts into the lead anchors.

NOTE: If necessary, shim under the frame sections so that the top edge of the frames will be flush with the finished floor surface, and the frames are level.

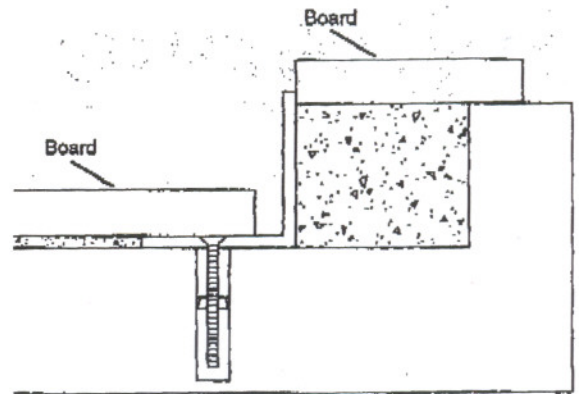


4. Pour concrete

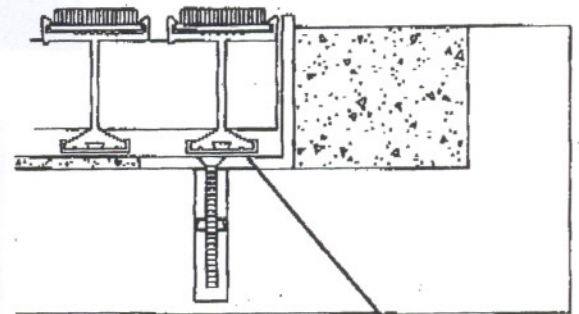
Pour concrete (or grout) around the edges and in the center of the frame.

5. Level the concrete

Cut a board just slightly shorter than the width of the frame.
Use the board to smooth and level the concrete.



Be very careful that the concrete is absolutely smooth and level with the inside lip of the frame. This will allow the grate to lie perfectly flat and avoid rocking.



Level the concrete so the grate will lie flat when installed.

6. Recheck all dimensions

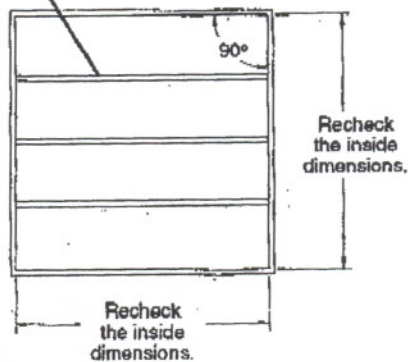
Before the concrete sets, recheck that:

- The frame sides are straight
- The frame corners are at correct angles so the grate will fit properly
- All inside dimensions of the frame are accurate according to drawing measurements

If the frame bows inward, use spreaders inside the frame until the concrete is thoroughly set.

IMPORTANT: The grate is made to fit snugly into the frame according to the drawing. Reese cannot be responsible for problems that result from improperly installed frames.

Use spreaders if frame bows inward.

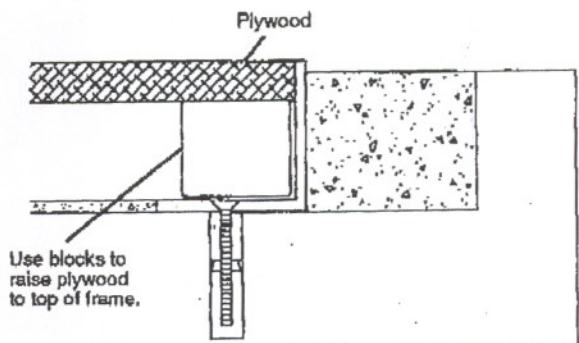


Recheck the inside dimensions.

Recheck the inside dimensions.

7. Protect the frame edges

When the concrete has hardened, install plywood or other material in the recess to protect the frame edges from damage until the grate is installed.



Use blocks to raise plywood to top of frame.