



## Mat Instructions: *Aluminum Hinge*

### Connecting Sections:

1. Lay both sections next to each other with the tread side down onto a clean surface to prevent scratching or staining.
2. Find the end of the mat that has the set screws holding the rails together. If the set screws are on opposite ends of the sections, turn sections around so they all line up.
3. Unscrew the set screw on one of the rails that will connect two sections with a 5/64 hex key.
4. Pull the loose rail off the one section.
5. Line up the two sections leaving just enough room for the one rail. Then slide the loose rail into the female side of one section and over the male side of the other section.
6. Attach rail to each section by screwing set screws on each side in the predrilled holes (This will ensure that the mat will be square). **CAUTION: BE CAREFUL NOT TO OVER TIGHTEN SET SCREWS. DOING SO MAY CAUSE A RAISED MARK ON THE TREAD SIDE OF THE MAT.**

### Trimming Vinyl Filler:

1. Lay mat flat with tread side up and use a straight edge to trim filler to be even with aluminum mat rails. Repeat on all corners of the mat.
2. Next lay mat in recessed flooring with the tread side up and push on both ends of the traffic direction to compact mat as much as possible.
3. Center the mat inside the recessed portion to ensure equal amounts of filler on either side.
4. Take box cutter to vinyl to trim filler to size. **NOTE: The alternating grooves of the filler are 1/8" wide with a 1/8" tab between. Cut slowly along one of the tabs to get a straight cut.**
5. Make sure mat fits (compacted) in the recessed portion of the floor.

### Replacing Vinyl Filler:

1. Lay mat with the tread side down onto a clean surface to prevent scratching or staining.
2. Find the two set screws (one on each end) that are drilled through the aluminum rails and unscrew using a 5/64 hex key.
3. Pull vinyl filler out of the aluminum rail and replace with new filler.
4. Replace set screws on each end in the predrilled holes. **CAUTION: BE CAREFUL NOT TO OVER TIGHTEN SET SCREWS. DOING SO MAY CAUSE A RAISED MARK ON THE TREAD SIDE OF THE MAT.**
5. Trim filler so it is flush with aluminum rails on each end.
6. Lay inside recessed floor then push on both ends of the traffic direction to compact mat as much as possible. Next use box cutter to trim filler to size. **NOTE: The alternating grooves of the filler are 1/8" wide with a 1/8" tab between. Cut slowly along one of the tabs to get a straight cut.**
7. Make sure mat fits (compacted) in the recessed portion of the floor.

## Replacing or Adding Aluminum Hinge Rail(s):

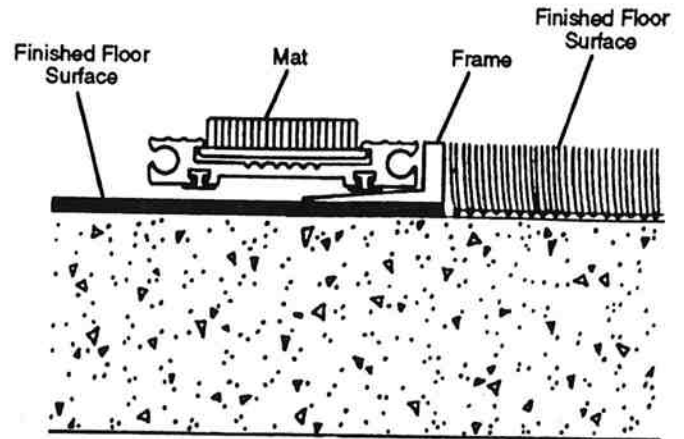
1. Lay mat on a flat surface with tread side down onto a clean surface to prevent scratching or staining, then locate set screws on one side of the width of the mat.
2. Locate aluminum rail or rails that need replaced and unscrew set screws on both sides of the area needing to be replaced with a 5/64 hex key. If adding rails unscrew set screws on both sides of any rail in the middle of the mat.
3. Once loose, pull rail(s) out of the connecting rails.
4. Replace with new rails by sliding replacements into the female portion of existing mat and over the male portion of the other section. When adding, slide sections apart to allow for additional needed space.
5. Once in place, set screws can be replaced into predrilled holes. **CAUTION: BE CAREFUL NOT TO OVER TIGHTEN SET SCREWS. DOING SO MAY CAUSE A RAISED MARK ON THE TREAD SIDE OF THE MAT.**
6. Flip mat so that tread is up and replace mat into recessed floor.



This frame is for surface  
or recess mounting.

## 1. Prepare the floor

Prepare the area on the flooring where the mat will be located.



## 2. Drill anchor holes

The mat 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 mat(s). Mark the hole locations on the concrete.

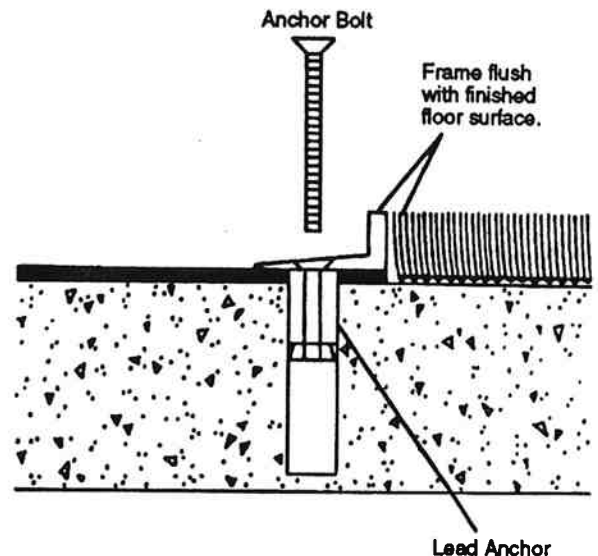
Remove the frames and drill holes in the floor for the anchors.

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 is flush with the higher finished floor surface, and the frames are level.

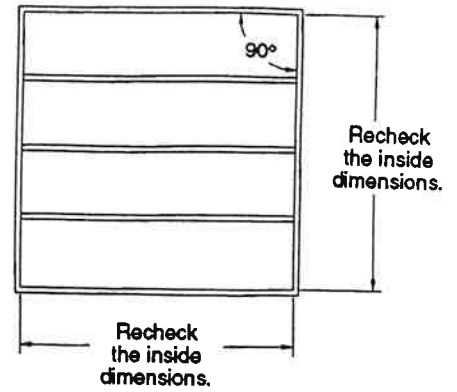


## 4. Recheck all dimensions

Recheck that:

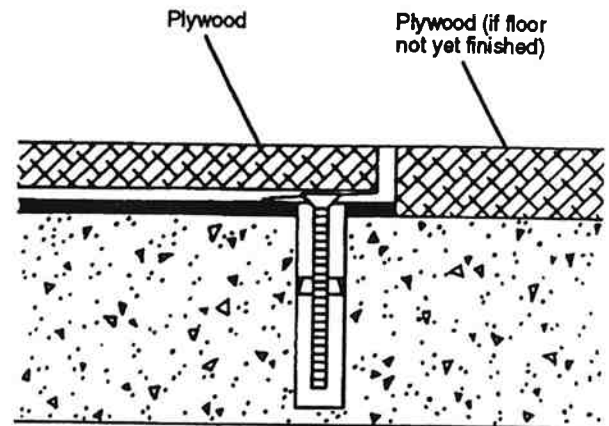
- The frame sides are straight
- The frame corners are at correct angles so the mat will fit properly
- All inside dimensions of the frame are accurate according to drawing measurements

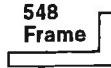
**IMPORTANT:** The mat is made to fit snugly into the frame according to the drawing. Reese cannot be responsible for problems that result from improperly installed frames.



## 5. Protect the frame edges

When the frame is anchored, install plywood or other material inside and (if necessary) outside of the frame to protect its edges from damage until the mat is installed.

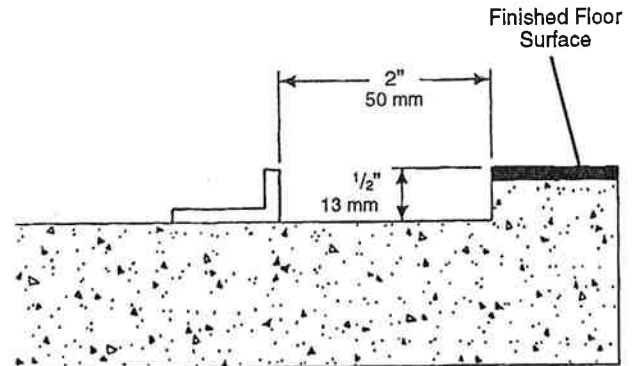




## 1. Prepare the floor recess

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

- 1/2" (13 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

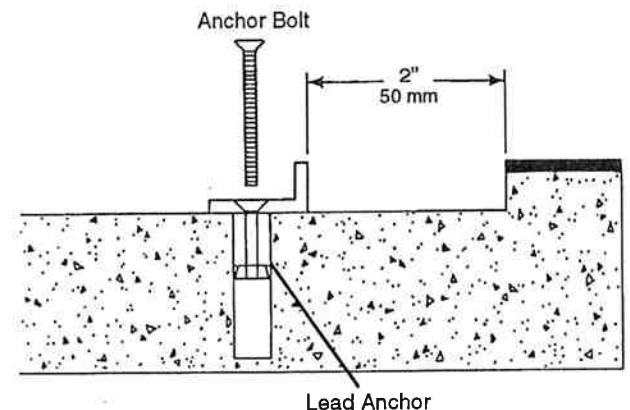
The mat frames should be secured to the concrete floor using anchor bolts into lead anchors that are set into the floor.

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 mat(s). Mark the hole locations on the concrete.

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

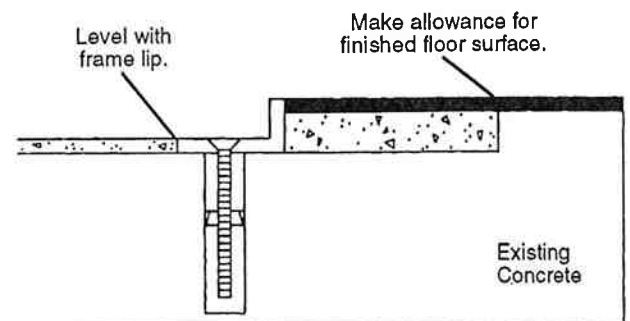
Install the anchors using an anchor setting tool.



## 3. Secure frames in the recess

Reinstall the frames. Secure them to the floor with 1/8" x 1 1/2" anchor bolts into the lead anchors.

**NOTE:** If necessary, shim under the frame sections so that the top edge of the frames is 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 mat to lie perfectly flat and avoid rocking.

## 7. Recheck all dimensions

Before the concrete sets, recheck that:

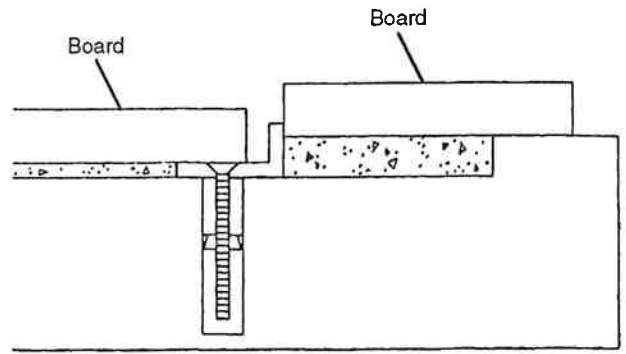
- The frame sides are straight
- The frame corners are at correct angles so the mat will fit properly
- All inside dimensions of the frame are accurate according to drawing measurements

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

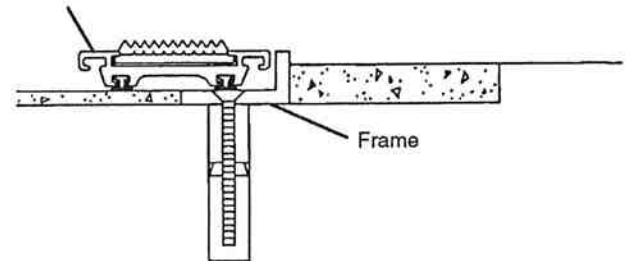
**IMPORTANT:** The mat is made to fit snugly into the frame according to the drawing. Reese cannot be responsible for problems that result from improperly installed frames.

## 8. Protect the frame edges

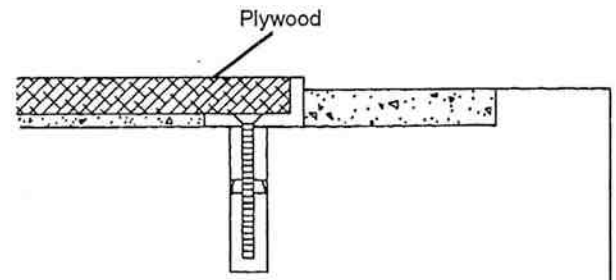
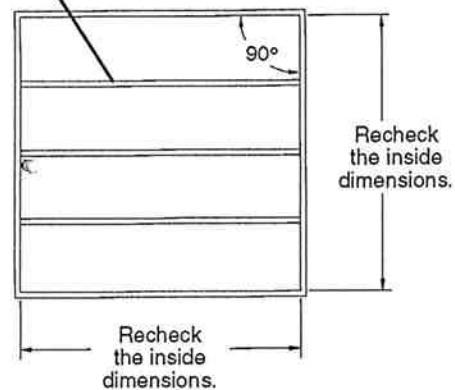
When the concrete has hardened, install plywood or other material in the recess to protect the frame edges from damage until the mat is installed.

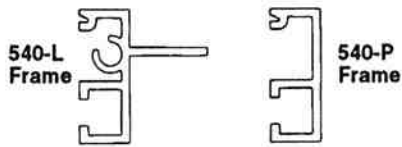


Level the concrete so the mat will lie flat when installed.



Use spreaders if frame bows inward.

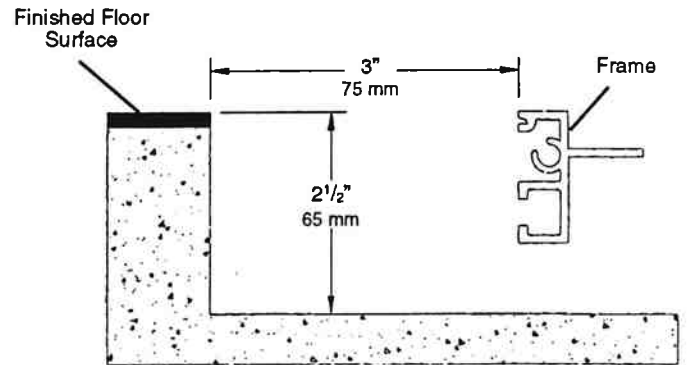




### 1. Prepare the floor recess

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

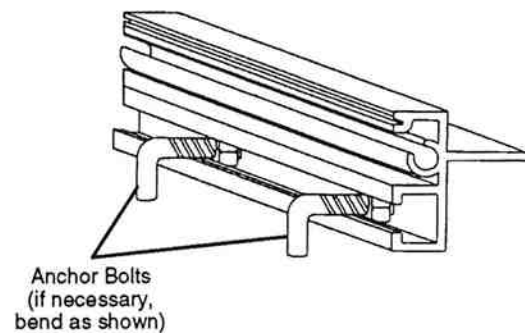
- 2½" (65 mm) deep
- 6" (150 mm) wider than the outside dimensions of the frame — this allows 3" (75 mm) on all sides to maneuver the frame into position



### 2. Install anchor bolts

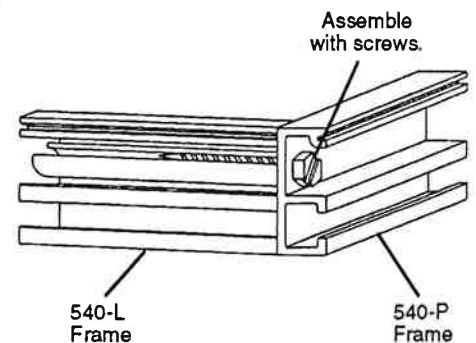
Slide ¼" x 3" anchor bolts (with nuts) into the frames from the end. If you were unable to allow the 3" (75 mm) spacing specified above, you may have to bend the bolts so the assembled frame will fit in the recess.

Space the bolts at approximately 2-ft (0.5-m) intervals along the frame sections.



### 3. Assemble the frame

Using the screws provided, assemble the frame.

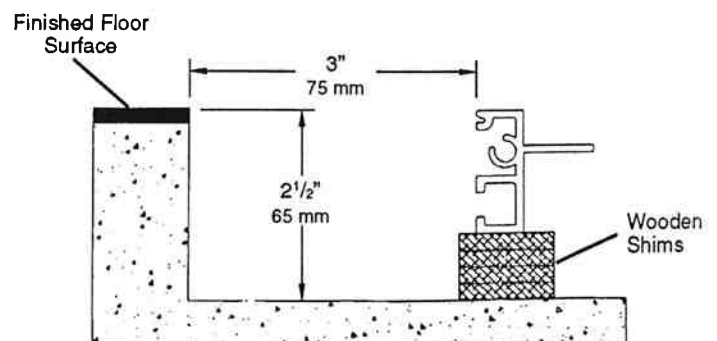


### 4. Place the frame in the recess

Set the frame in the recess at the desired location.

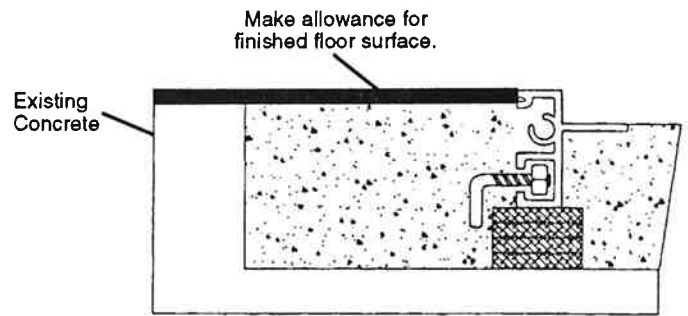
Use wooden shims to:

- Raise the frame so the top will be flush with the finished floor surface
- Level the frame



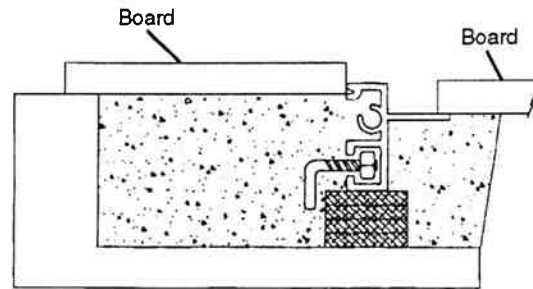
## 5. Pour concrete

Pour concrete (or grout) around the edges and in the center of the frame, until the concrete is level with the lip on the 540-L frame sections.



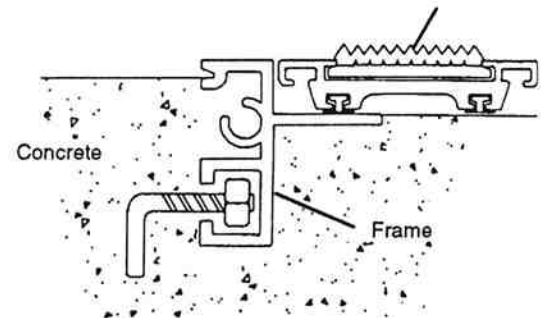
## 6. Level the concrete

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 mat to lie perfectly flat and avoid rocking.

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



## 7. Recheck all dimensions

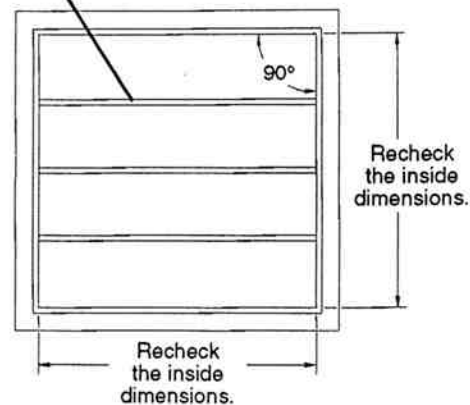
Before the concrete sets, recheck that:

- The frame sides are straight
- The frame corners are at correct angles so the mat 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.

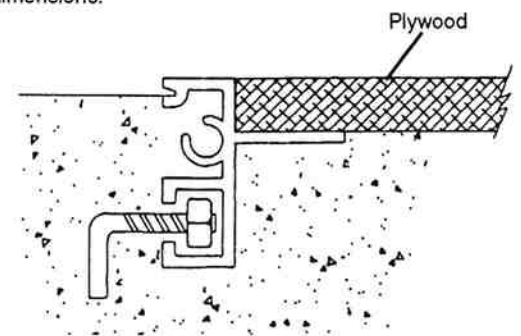
**IMPORTANT:** The mat is made to fit snugly into the frame according to the drawing. Reese cannot be responsible for problems that result from improperly installed frames.

Use spreaders if frame bows inward.



## 8. 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 mat is installed.







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### Reese 544 Frame Installation Instructions

1. **Drill anchor holes:** The mat 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 approximately 2 foot intervals for the bolts. Countersink the holes
  - Set the frames at the appropriate locations on the floor. All pieces must be held tightly together so that mitered ends are flush with each other. 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
2. **Secure frames:** Reinstall the frames. Secure them to the floor with 1/8" x 1 1/2" anchor bolts into the lead anchors
3. **Install mat inside frames:** Unroll the mat, and determine how much filler should be trimmed so that mat fits snugly between aluminum frame. ***The mat is made to fit snugly into the frame according to the drawing. Reese cannot be responsible for problems that result from improperly installed frames.***
  - Trim filler an equal distance from both ends so that mat fits snugly inside frame