Creating a Parapet Roof

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The information in this article applies to:

PRO   ARCH   SUITE

QUESTION

How do I create a flat roof with parapet walls?

ANSWER

Follow the instructions below to create a flat roof structure with parapet walls.

To draw the initial plan

1. Select **Build> Wall> Straight Exterior Wall** 🔲 and draw four walls in a clockwise manner to make a simple rectangular house.

In this example, the Brick-6 Wall Type was used for four exterior walls.

2. Select **Build> Floor> Build New Floor** from the menu to open the **New Floor** dialog.

3. In the **New Floor** dialog, choose **Make new blank plan for the 2nd Floor** to create a new floor work area and click **OK**.
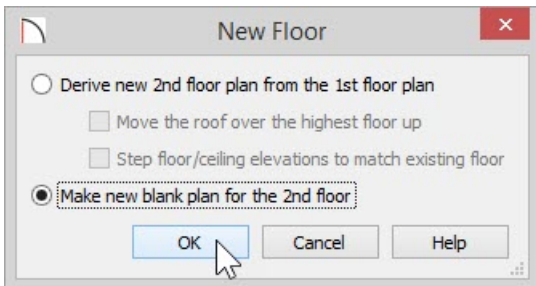
4. After clicking the **OK** button, the **2nd Floor Defaults** dialog will display, which allows you to enter in a value for the **Finished Ceiling**.
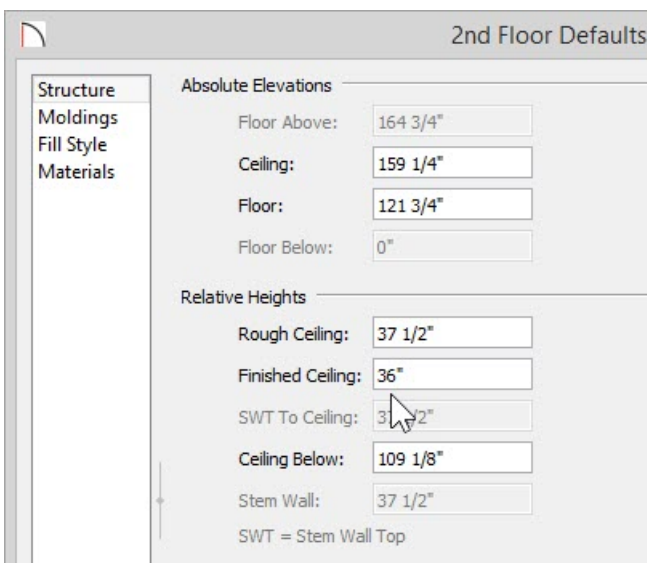
For the purposes of this example, we will set this value to 36".

Once the first floor is created, we are ready to begin on creating the parapet for our second floor.

To create parapet walls over the first floor

1. With Floor 2 active , select **Tools> Floor/Reference Display> Reference Display** , or press the **F9** hotkey keyboard shortcut, to see how the second floor relates to the first story.

2. Select **Build> Wall> Straight Half-Wall** and draw four half walls in a clockwise manner directly on top the reference for the first floor walls to make a simple enclosed rectangular structure.

> **Note:** In some versions of the software, the Straight Half-Wall tool may not be available. In these programs, you should instead use a Straight Railing defined as Solid on the Railing panel of its specification dialog.

3. The Half Walls should snap directly to the reference display lines of the first floor walls, however, if you create a half wall and it is not aligned, select the **Align With Wall Below** edit tool.

> You can also select the wall, Zoom In, hold down the Ctrl key on your keyboard to allow for unrestricted movement, and use the half-wall or solid railing's Move edit handle to precisely position it.

After your Half-Walls or Solid Railings have been created, you can adjust how they display.

To Adjust the Display of Your Parapet Walls

1. Using the **Select Objects** tool, select one of the Half Walls, and click on the **Open Object** edit button to display its Specification dialog.

2. On the GENERAL panel, set the **Thickness**.

    For the purposes of this example, we will set the value to be 10 7/16" so that it matches the Brick-6 Wall Type used on Floor 1.

3. On the NEWELS/BALUSTERS panel, specify the **Railing Height**.
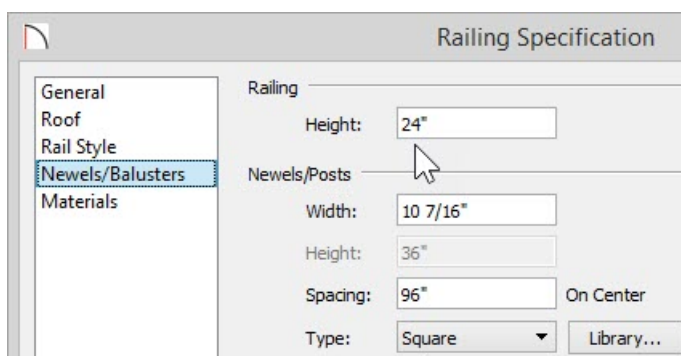
For the purposes of this example, we will set this value to be 24"

> Make sure that you do not set the Railing Height value higher than the Finished Ceiling Height you specified earlier, or the Railings will not display correctly.

4. Once you have completed these changes, click **OK** to apply them and close the **Railing Specification** dialog, and repeat the process for the remaining three Half Walls on Floor 2.

Now that we have completed drawing in the parapet walls on Floor 2, we are ready to modify the room that makes up the inside of the parapet.

Defining the Second Floor Parapet Room

1. Using the **Select Objects** ⟍ tool, click in the middle of the second floor room, and then select the **Open Object** ⊓ edit button to display the **Room Specification** dialog.

2. In the **Room Specification** dialog, on the Structure panel, verify that the **Finished Ceiling** is set to 36" and then uncheck **Flat Ceiling Over This Room** and **Roof Over This Room**.
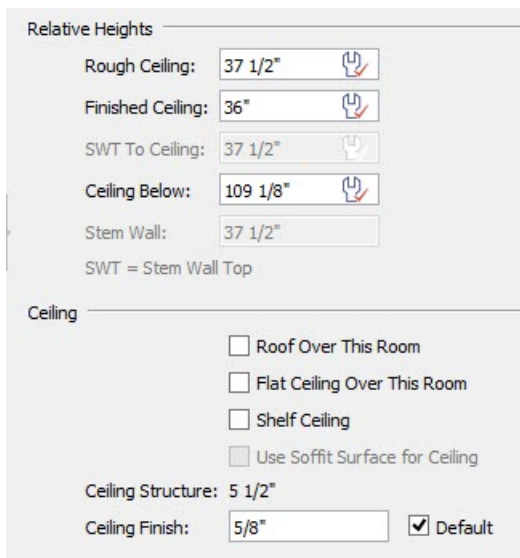

3. On the Moldings panel, uncheck **Use Floor Default** and click on the **Delete** button to remove the Default Base Molding if one is applied.

4. Go to the Materials panel and select **Floor Finish**, then click the **Select Material** button to display the **Select Material** dialog.
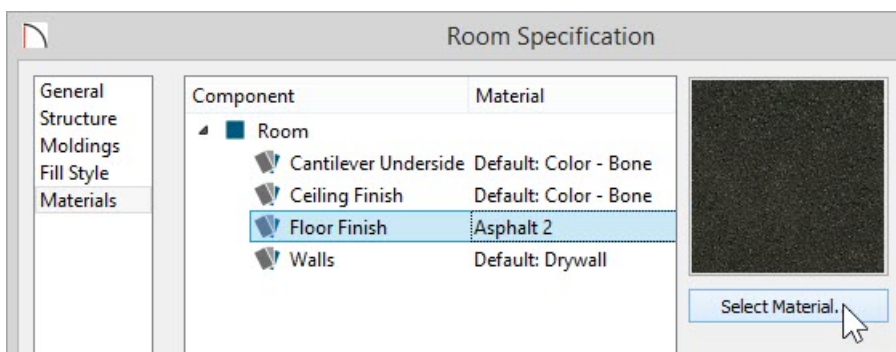
5. Browse to an appropriate material, then click **OK** to apply the changes so it is visible in the **Room Specification** dialog for the Floor Finish.

For the purposes of this example, we used the Asphalt 2 material

6. Next, select **3D> Create Camera View> Perspective Full Overview** to see your flat roof parapet wall structure thus far. In Home Designer Pro, select 3D> Create Perspective View> Perspective Full Overview.
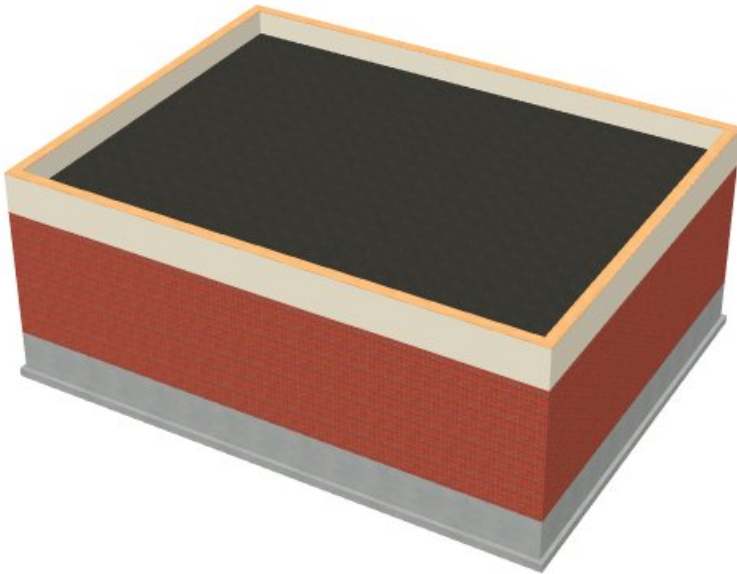
While still in your 3D camera view, you can change the materials associated with your railings to match the rest of the house.

To Change the Materials of the Parapet Walls in a Camera View

1. Select **3D> Material Painter> Material Eyedropper** .

2. Click on the exterior wall material for the wall below the railing to select that material, activating the Material Painter in Component Mode, which changes your mouse cursor to look like this .

3. With the Material Painter spray can tool active, click on the exterior of each railing to change it to the same material as the wall below.

4. Once all of the railings are matching exterior materials with the wall below, you can select**3D>Material Painter> Material Painter** to display the **Select Material** dialog, browse to an appropriate material, and apply it to the handrails for the tops of the Half Walls as well.
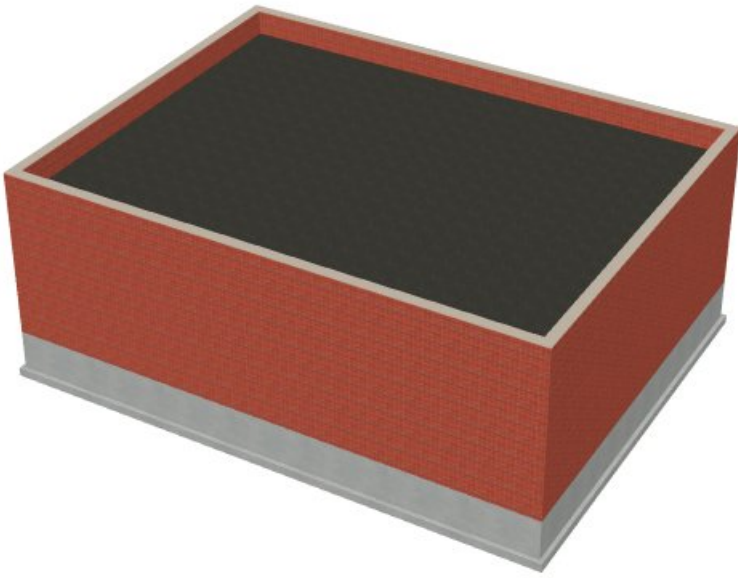
You are now ready to further customize the plan, or take the knowledge you have gained and apply it to your own parapet design.