

Hollow Cube 60 – Cubes in a Cube



4- 5 hour class. Difficulty 4 Stars. This technique is very Escher like. Add the illusion that light is shining on your quilt from the direction you choose by adding Hollow Cube 60's. Staying organized is essential, but these cubes are very simple to construct. You will be making 5" Hollow Cubes place in a 15" Hollow Cube. Approximately 20" x 22"

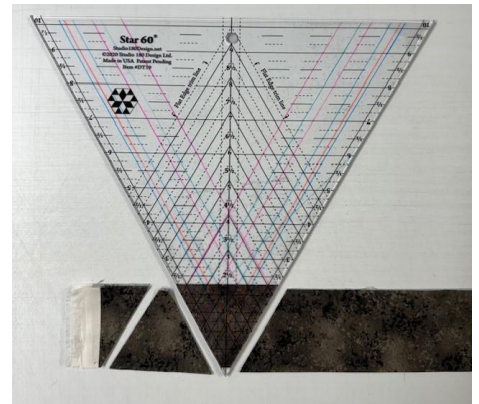
Does everyone have InvisiGrip on the back of their Star 60 Tool?

3" cubes into 9" Cube
4" Cubes into 12" cube
5" cubes into 15" cube
6" cubes into 18" cube

Making the 5" cubes

Step 1 – Sub-cut 6 triangles. Place the 2 ¼" triangle strip of fabric horizontally on the cutting mat. Position the Star 60 tool with the tip pointing away from you. Position the small horizontal guideline on the top edge of the fabric and the 2 ¼" horizontal guideline on the bottom edge of the fabric.

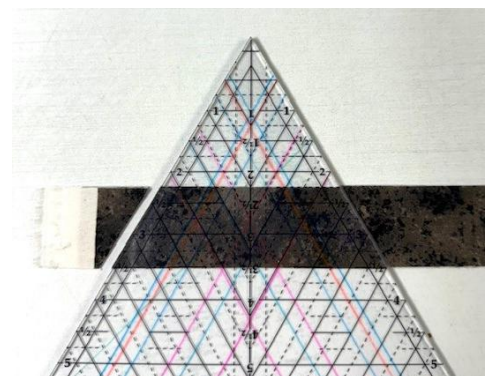
Make an angled cut on either side of the tool. Rotate the tool so that the tip is now pointing toward you. Realign the tool on the strip of fabric using the horizontal guidelines. Make one angled cut. Continue down the strip to yield 6 triangles of each color.



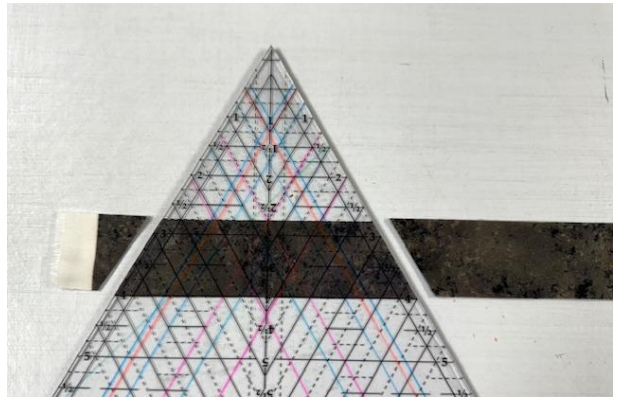
Step 2- Cut 6 short frames. Place the 1 ¼" frame strip of fabric horizontally on the cutting mat. Position the Star 60 tool with the tip pointing away from you. Position the 2 ¼" horizontal guideline on the top of the strip.

Cut on both sides of the Star 60 tool. Rotate the tool so that the tip is now pointing toward you. Realign the tool on the strip of fabric using the horizontal guidelines. Make one angled cut.

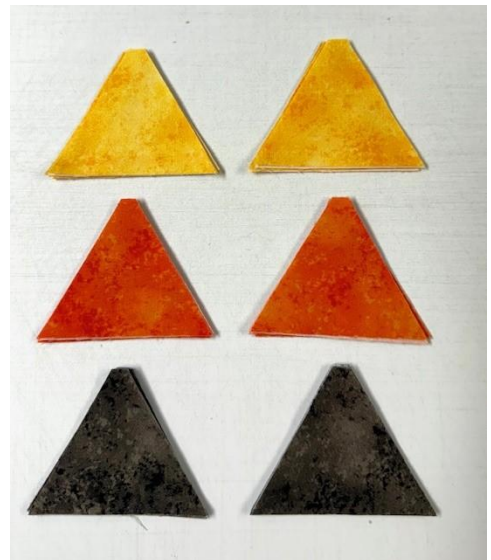
Continue down the strip to yield 6 short frames from each color. Place cut frames on a paper plate labeled Short Frames.



Step 3 - Cut 6 long frames. Place the 1 ¼” frame strip of fabric horizontally on the cutting mat. Position the Star 60 tool with the tip pointing away from you. Position the 2 ¾” horizontal guideline on the top of the strip.



Make an angled cut on either side of the tool. Rotate the tool so that the tip is now pointing toward you. Realign the tool on the strip of fabric using the horizontal guidelines. Make one angled cut. Continue down the strip to yield 6 long frames from each color. Place cut frames on a paper plate labeled Long Frames.



Step 4 – Layout

Divide each color set of triangles into 2 piles, of 2 each.

Combine:

- 1 set of medium with 1 set dark triangles
- 1 set of light with 1 set of dark triangles
- 1 set of light with 1 set of medium triangles



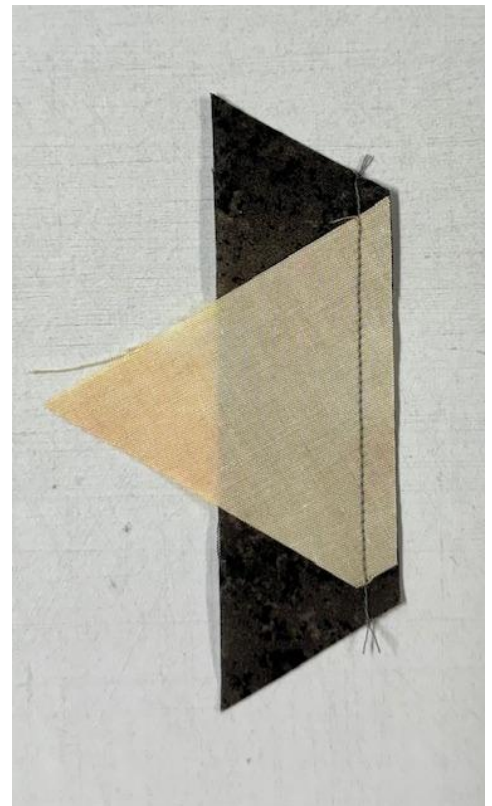
Step 4 - Continued - Lay out and organize the triangles, short frames and long frames into the following combinations:

- Group the medium & dark triangles with the light short & long frames.
- Group the light & dark triangles with the medium short and long frames.
- Group the light & medium triangles with the dark short & long frames.

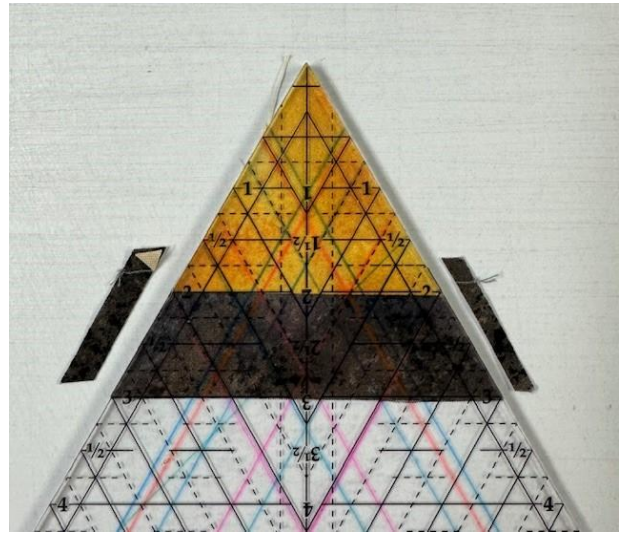


Step 5 - Position the triangle on the short frame by placing the pointed end of the triangle with the end of the frame, leaving the blunt end about ¼ ” from the end of the frame.

Stitch with the triangle on top and press the seam toward the triangle. Repeat for all 3 groups.



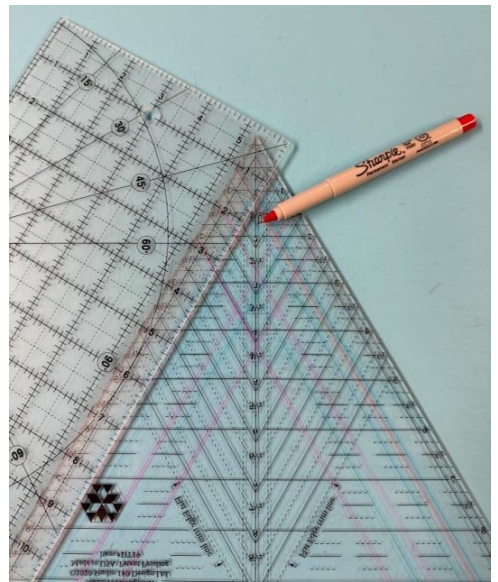
Step 6 – Trim the short frame. Position the Star 60 tool on the unit with the tip of the unit and the tip of the tool pointing away from you. Place the 2” horizontal guideline on the seam line. You should only be trimming the short frame.



Step 7 – Position the matching long frame on the left side of the pieced triangle. You can center the placement of the pieced unit on the long frame. There should be a little bit of extra at either end. Stitch and press toward the long frame.



Step 8 - Draw the Frame Trim Down Lines on the back of your Star 60® tool. For a 5” cube, draw two lines $\frac{3}{4}$ ” from the tool edge.



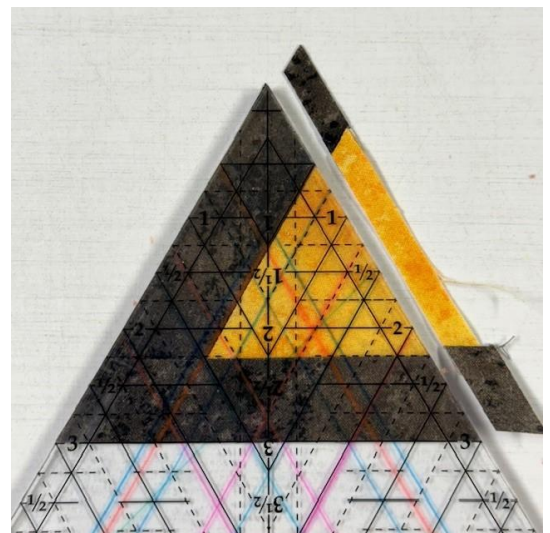
Step 9 - Position the Frame Trim Down Lines you just drew on the seams between the triangle and the frames. Trim.



Step 10 - Locate the Base Trim Line column in the chart – for a 5” cube it is 3”.

Position the triangle with the base to the right if right handed, or to the left if left handed.

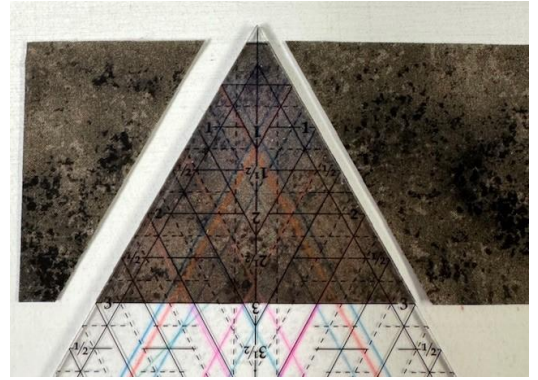
Align the edge of the Star 60® tool and the 3” Base Trim Line number with the previously trimmed frame. Trim the bottom of all units.



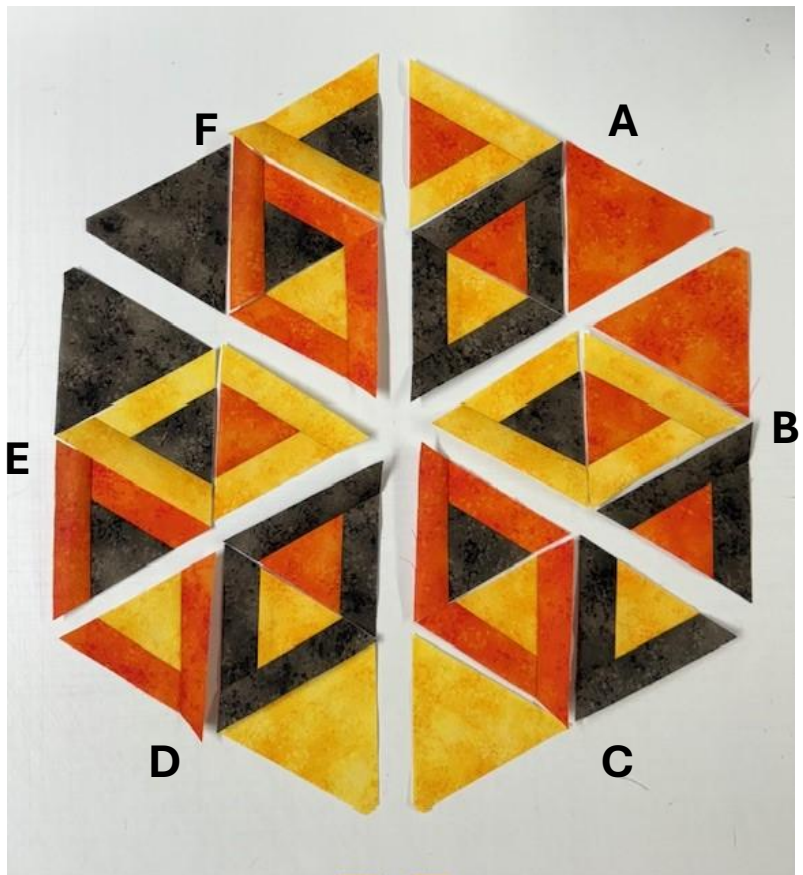
Preparing The 15" Cube

Step 11 – Choosing Triangle size- choose the strip size that corresponds to the Base Trim on the Hollow Cube 60 technique sheet for the size you are making.

For 5" finished cubes inside of a 15" cube - cut 1 – 3" strip from each color. Cut 2 - 3" triangles from each color as shown right. Place the 3" horizontal line on the bottom of the strip and cut. (Save remaining strip for Frames, see page 9 of handout.)

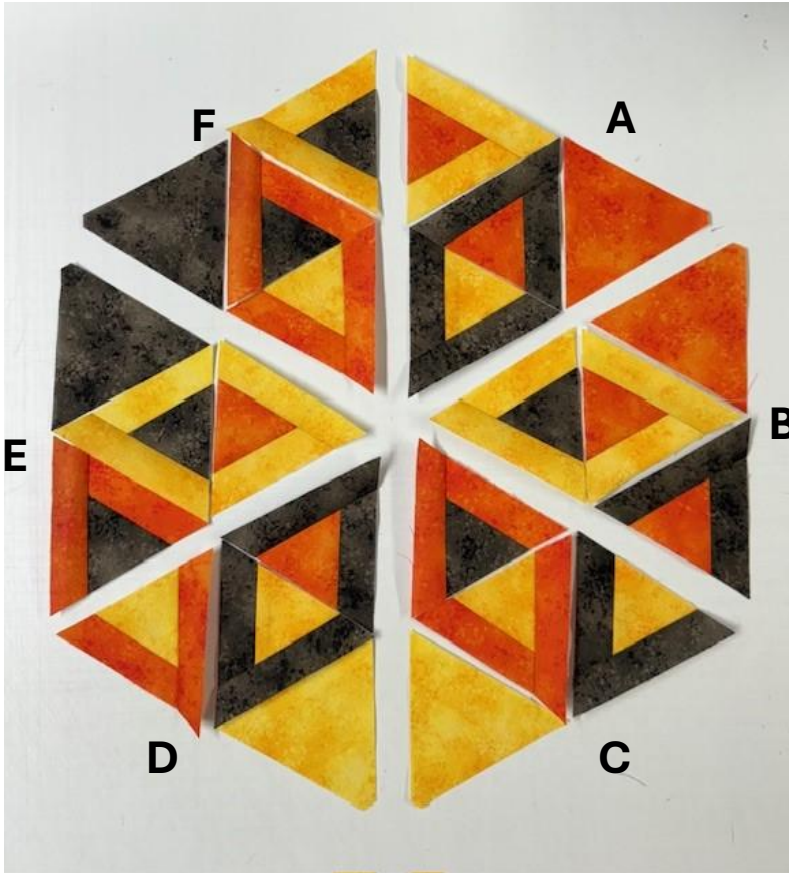


TIP: Label 6 paper plates A –F for each wedge to help stay organized.



See next page.

Step 12 - Lay Out the Hollow Cube units as shown below keeping the flat edge of the large triangles facing outward for consistency:



A Plate has 1 each:

- Dark frame medium triangle
- Dark frame light triangle
- Light frame medium triangle
- 3" medium triangle

B Plate has 1 each:

- Light frame medium triangle
- Light frame dark triangle
- Dark frame medium triangle
- 3" medium triangle

C Plate has 1 each:

- Medium frame light triangle
- Medium frame dark triangle
- Dark frame light triangle
- 3" light triangle

D Plate has 1 each:

- Dark frame light triangle
- Dark frame medium triangle
- Medium frame light triangle
- 3" light triangle

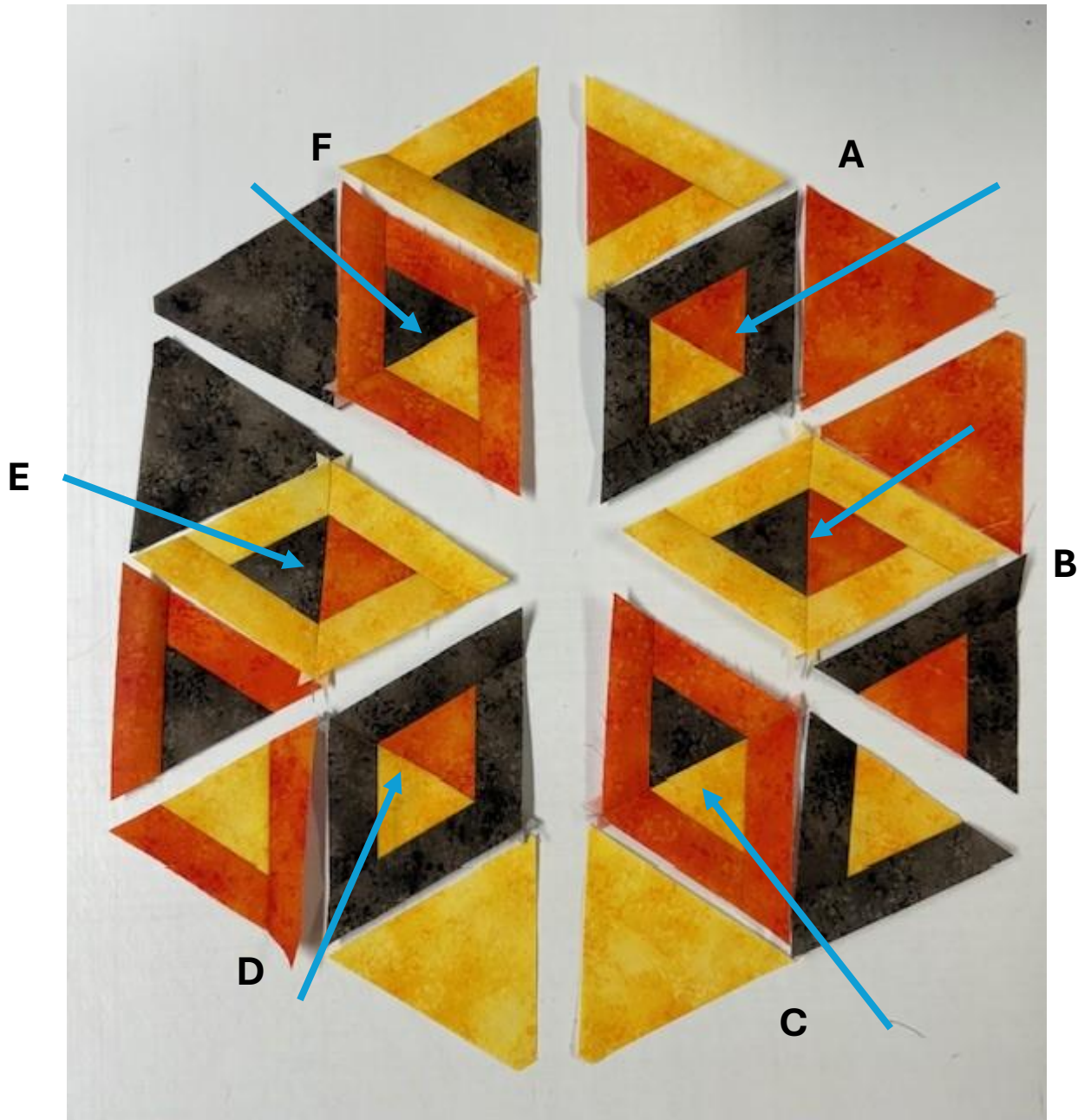
E Plate has 1 each:

- Light frame dark triangle
- Light frame medium triangle
- Medium frame dark triangle
- 3" dark triangle

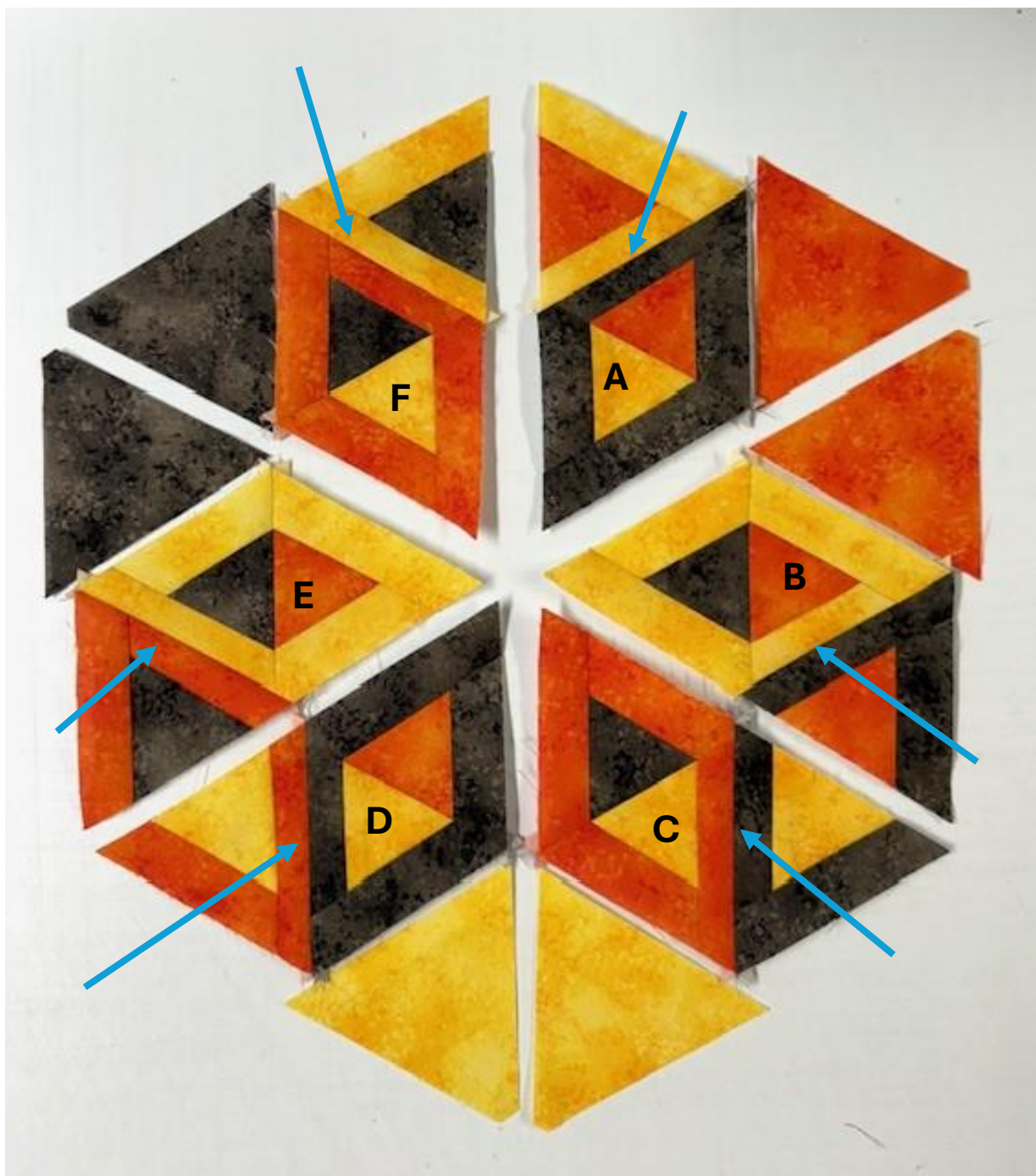
F Plate has 1 each:

- Medium frame dark triangle
- Medium frame light triangle
- Light frame dark triangle
- 3" dark triangle

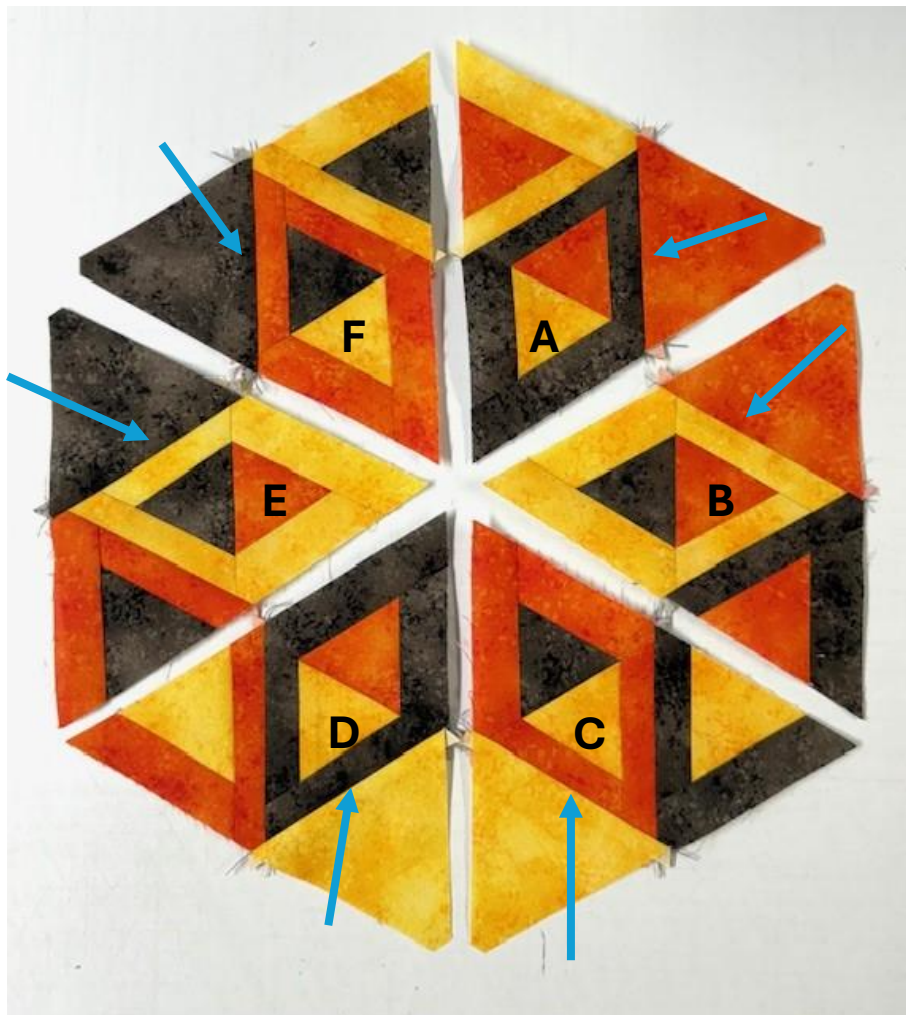
Step 13 - Stitch together the light, medium and dark framed triangles in each triangle layout A, B, C, D, E & F as shown below, press open.



Step 14 - Stitch the remaining frames together for each light, medium & dark triangle layout as shown below: *(Pay close attention to layout)*



Step 15 - Stitch the 3" triangles to the frames as shown below, completing each triangle. Press toward the triangle.

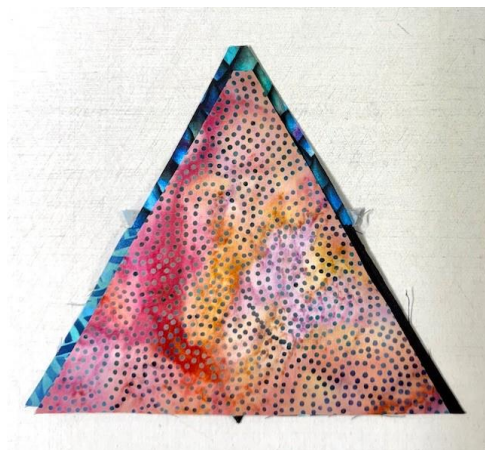


Adding the Framing Strips to 5" Cube Units

The pieced triangle created in Step 14 is $\frac{1}{4}$ " larger than if you cut it from a whole strip size listed in the Hollow Cube 60 Technique Sheet. Therefore, the frame strip size should be reduced by $\frac{1}{4}$ ".

Frame Strip Sizes: Use leftover 3" triangle strip & trim to frame size needed:

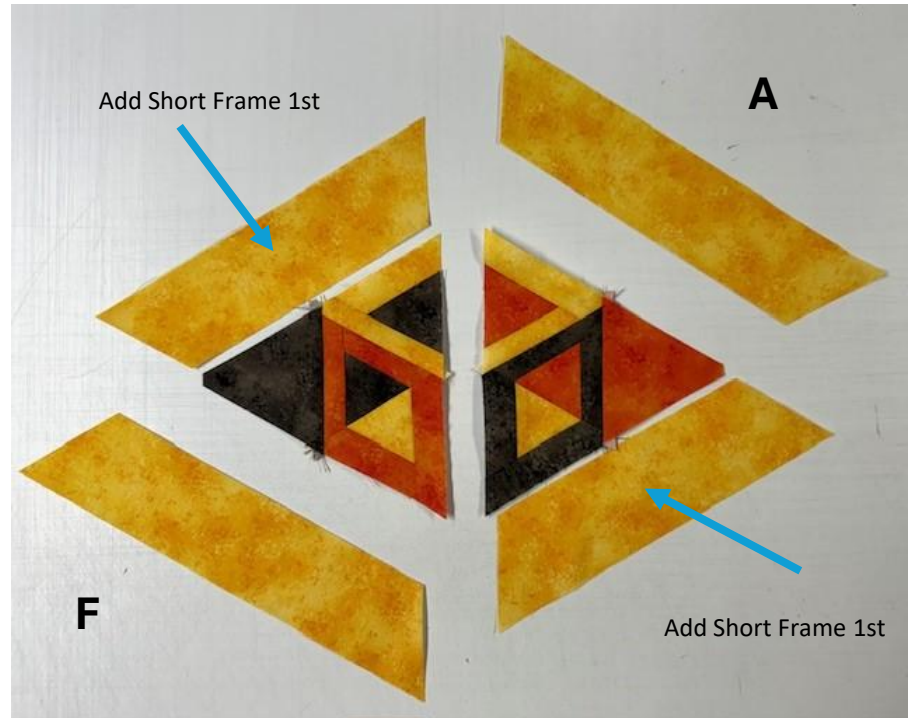
- 4" cubes inside of a 12" cube: trim leftover 3" triangle strip to $1 \frac{3}{4}$ "
- 5" cubes inside of a 15" cube: trim leftover 3" triangle strip to 2".
- 6" cubes inside of an 18" cube: trim leftover 3" triangle strip to $2 \frac{1}{4}$ ".



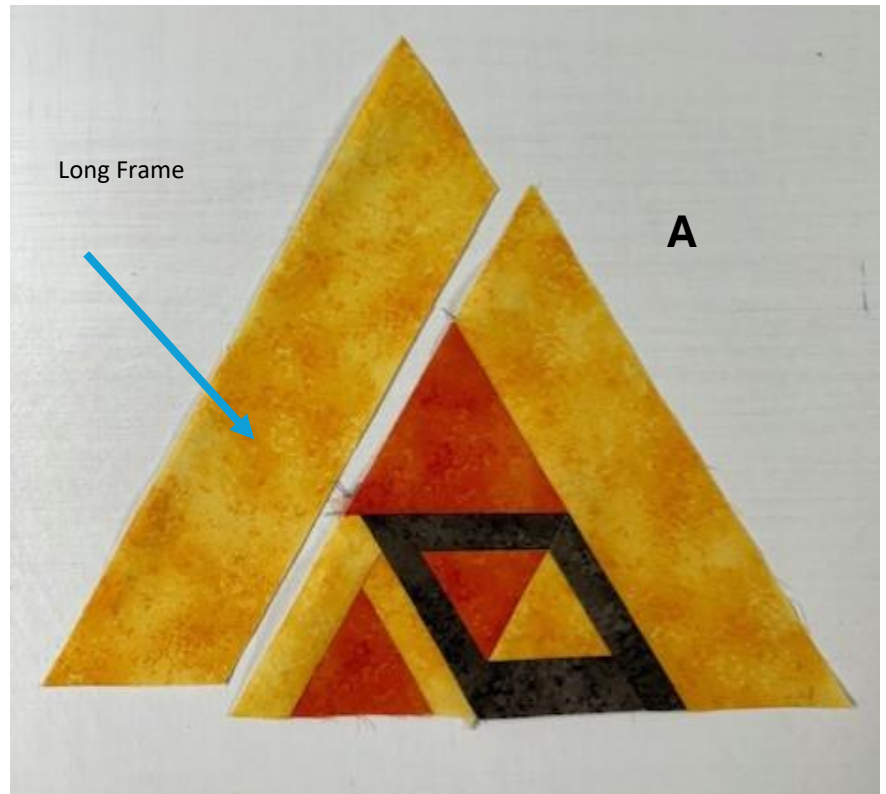
Step 16 – For 15” Cube - cut your short and long frames from a 2” strip of fabric. *Cut 2 short & 2 long frames from each color..*

- **Short Frame** – 5.25” horizontal line on top, cut 2 of each color.
- **Long Frame** 6.75” horizontal line on top – cut 2 of each color.

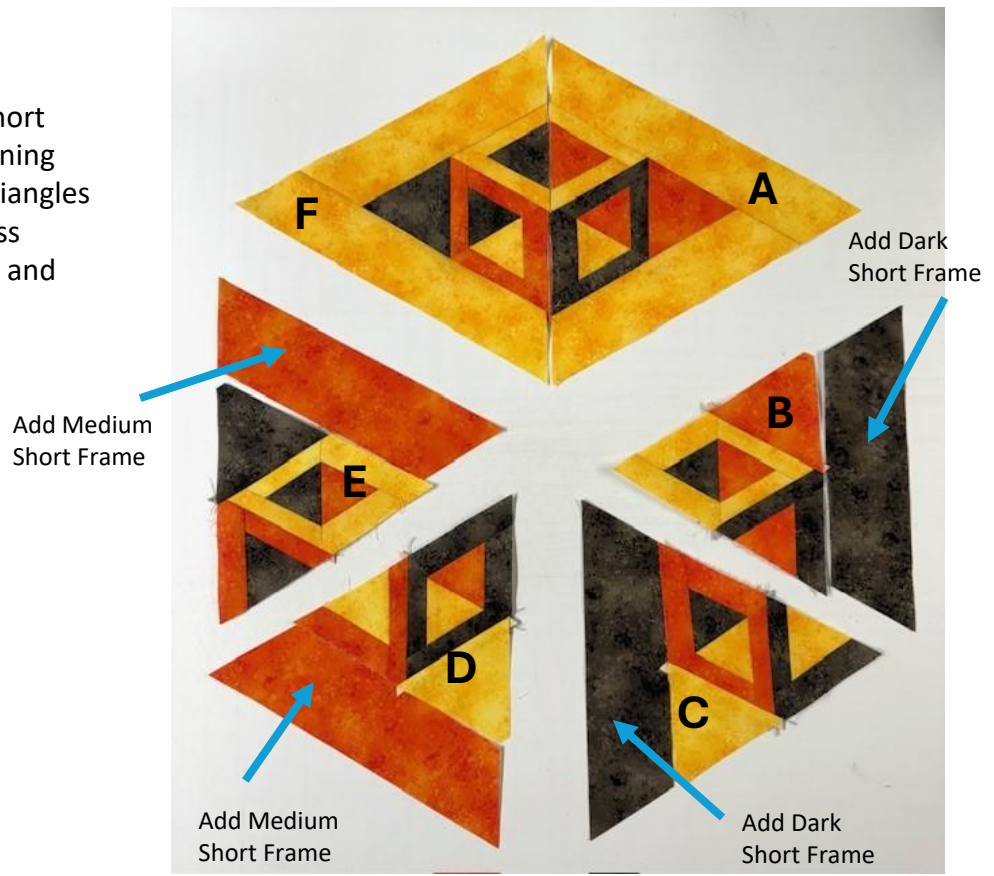
Lay out and stitch the light short frames as shown left. Press toward the triangle. Trim any excess frame. **DO NOT TRIM TRIANGLE.**



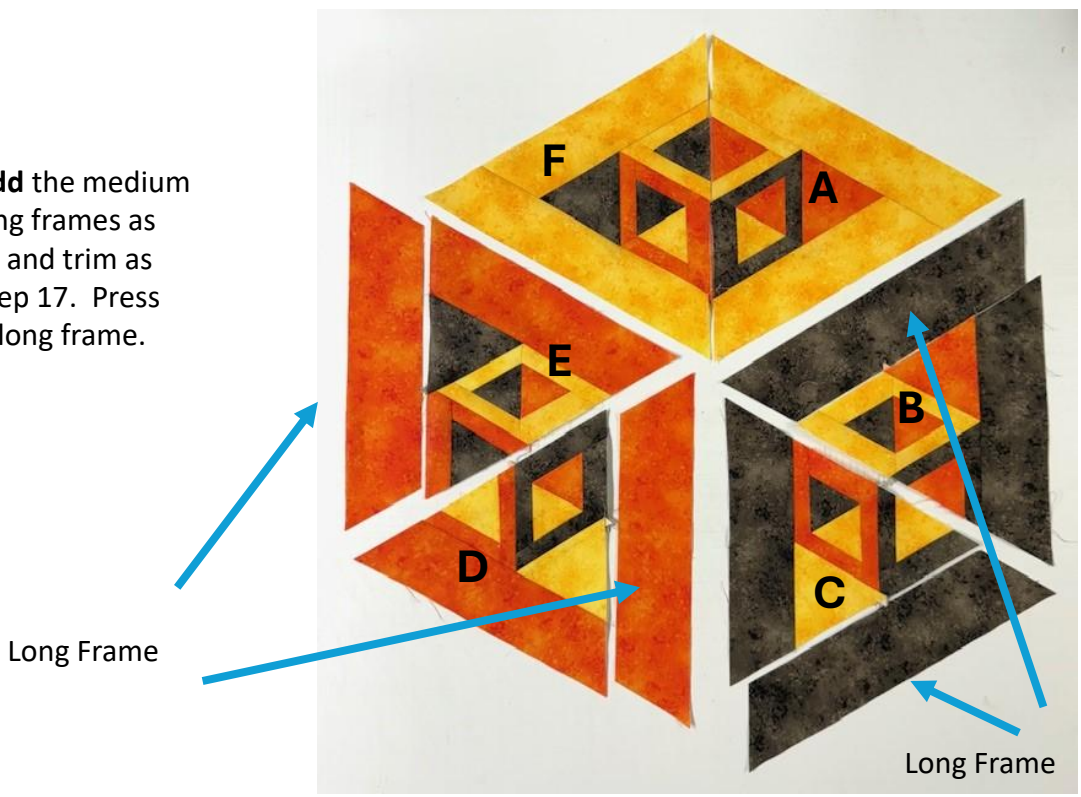
Step 17 - Add the long frame as shown to units A and F. Press toward the frame.



Step 18 - Add the short frames to the remaining medium and dark triangles as shown here. Press toward the medium and long frames.



Step 19 - Add the medium and dark long frames as shown here and trim as shown in Step 17. Press toward the long frame.



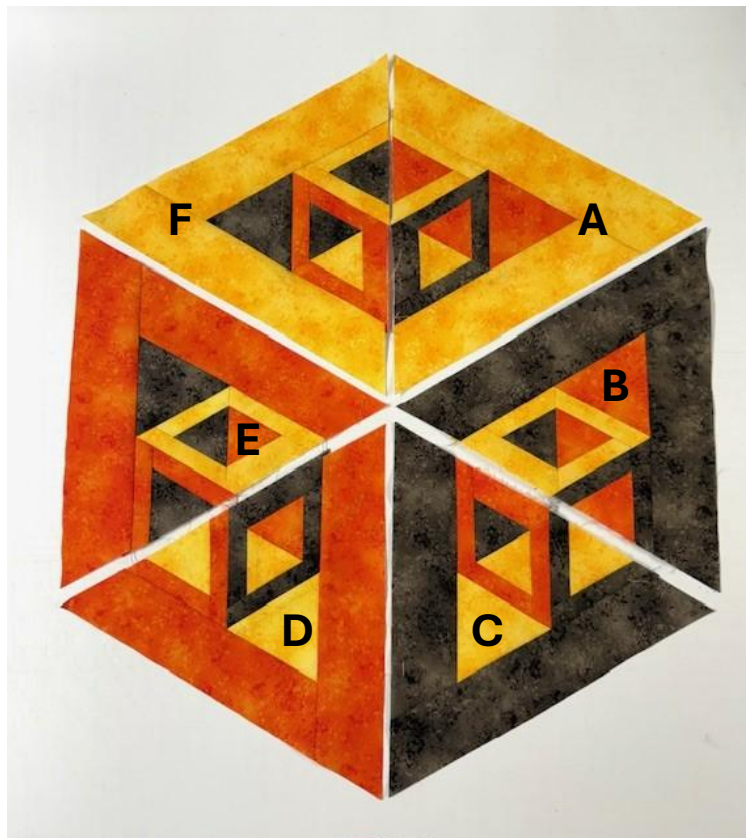
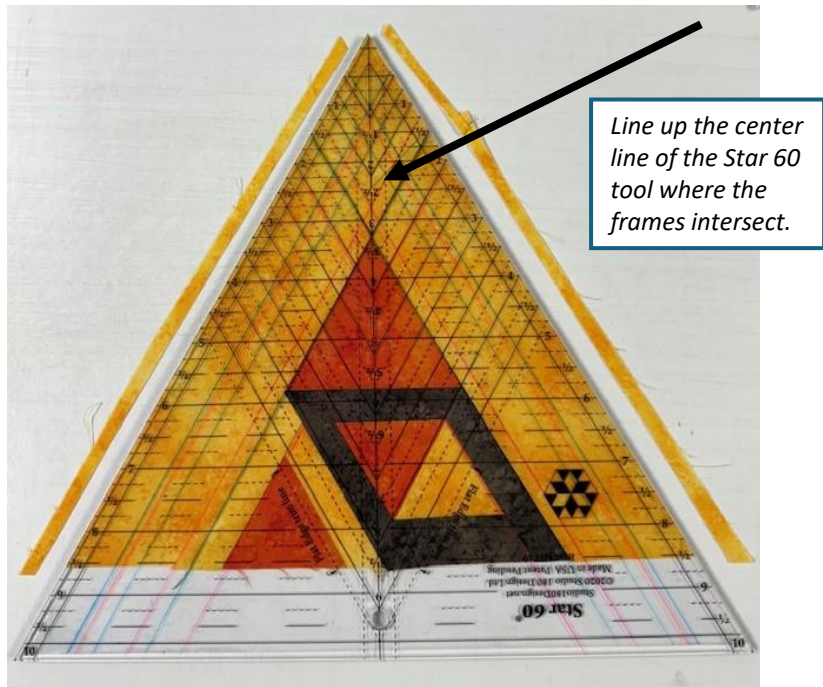
NOTE: Frame Trim Down Lines should be reduced by $\frac{1}{4}$ ":

- 12" Cube" Trime Down Line to be marked on the back of your Star 60 tool is $1 \frac{1}{4}$ "
- 15" Cube" Trime Down Line to be marked on the back of your Star 60 tool is $1 \frac{1}{4}$ "
- 18" Cube" Trime Down Line to be marked on the back of your Star 60 tool is $1 \frac{3}{4}$ "

Step 20 - Position the Frame Trim Down Lines you just drew on the sides of the triangle and the frames and line up the center line of the Star 60 tool where the frames intersect. Trim and press toward the frames.

Do NOT do a Base Trim, unless the frame strips extend past the partial cube. Do not trim the cube!

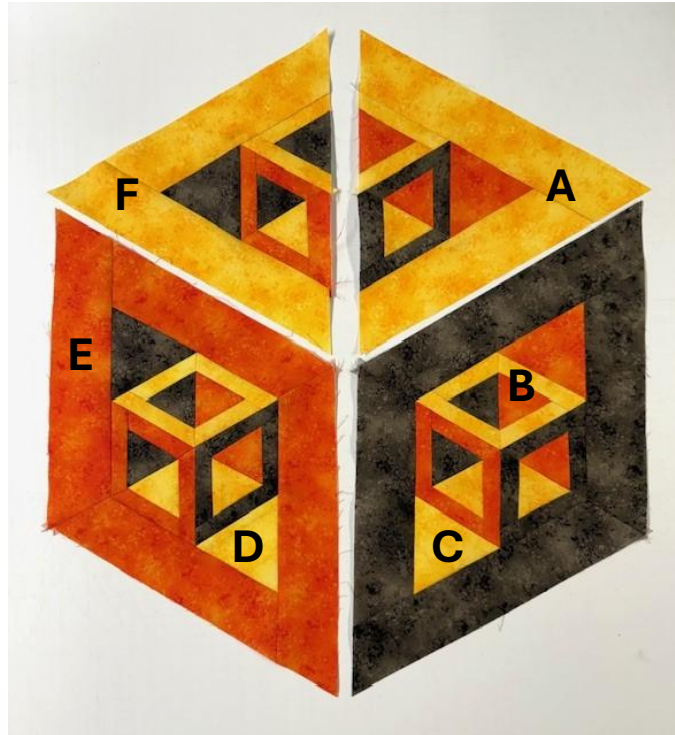
Step 21 - Lay out the triangle sections as shown:



Step 22 – Stitch the medium framed triangles together. Press seams open. Repeat with the dark framed triangles.

Stitch the light framed triangle with the dark background to the medium framed triangles.

Stitch the light framed triangle with the medium background to the dark framed triangles.



If you are adding the Cube in a Cube to a One Block Wonder - Do not stitch the halves together.

If you are making the Cubes in a Cube into a wall hanging, add Half Rectangle Triangles to both ends of the cube halves before sewing them together.

See chart on page 2 of the Star 60 Tool Instructions, last column for the size units you are making and page 10.

