

Photography

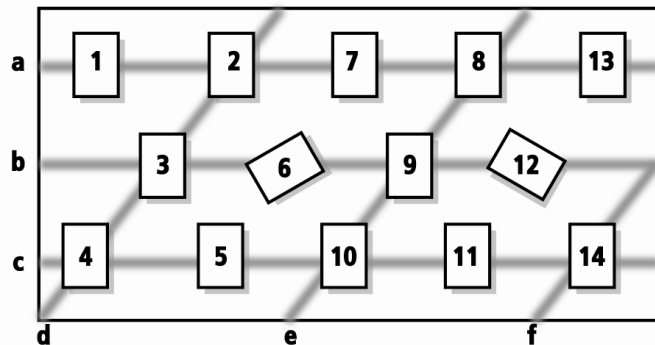
Team G

Before You Start

As a photographer, you need to have a photography portfolio that showcases your pictures. It is a good idea to arrange your pictures in a creative, artistic way. You also decide to frame a few of your favorite photos from your portfolio and use one for an advertisement in a newspaper.

Activity

One page of your portfolio is shown. You use ribbons behind the photos to make a crisscross pattern.



1. Which ribbons are parallel to Ribbon a?

2. Which ribbons are parallel to Ribbon d?

3. You want to add an additional photo. Where can you place Photo 15 so that it is on a ribbon that is parallel to two other ribbons? Explain.

You want to enlarge one of your favorite photos so that you can frame it. The photo is 4 in. by 6 in. The enlargement should fit in the frame without needing to trim the edges or have any white space around it.

4. Can each frame size work for your photo enlargement? Explain.

a. 8 in. by 10 in.

b. 10 in. by 15 in.

c. 13 in. by $19\frac{1}{2}$ in.

You want to include one of your 8 in. by 10 in. photos in an upcoming newspaper advertisement.

5. You need to reduce the photo size so that it fits into the 3 in. by 4 in. space that accompanies the advertisement without cropping the photo.
- a. What are the dimensions of the largest photo that will fit in the advertisement? Explain.

- b. If you choose one of your 5 in. by 7 in. photos to use instead, what will be the dimensions of the largest image that can be used with the advertisement? Explain.

6. **QUICK REPORT** Use your results from this activity to complete the report below. In the first column, list the ribbons that are parallel to Ribbon d. In Column 3, use the photo obtained by reducing your 8 in. by 10 in. photo.

Parallel Photo Ribbons	Possible Frames for Photo Enlargement	Dimensions of Largest Ad Photo

7. **REFLECT** Explain how you used each skill in this activity.

- a. identifying parallel lines

- b. identifying similar figures

- c. solving equations
