Activity 12 — Transformations

Objectives

This activity is designed to help students discover the relationships between a pre-image and its image when reflected across parallel lines and across intersecting lines.

Vocabulary

polygon	symmetry
reflection	parallel
transformation	translation
pre-image and image	rotation

Prerequisites

Students must understand how to:

✔ *Construct a line.*

✔ *Construct a parallel line.*

✔ *Construct intersecting lines.*

Answers

6. The transformation is a translation.

13. Distances are equal.

14. The distance between the parallel lines is half the distance of the image and pre-image.

22. The transformation is a rotation.

31. The angle from the pre-image to image is twice the angle of rotation.

33. No, it is not true for an obtuse angle because you are reading the angle from the other direction.
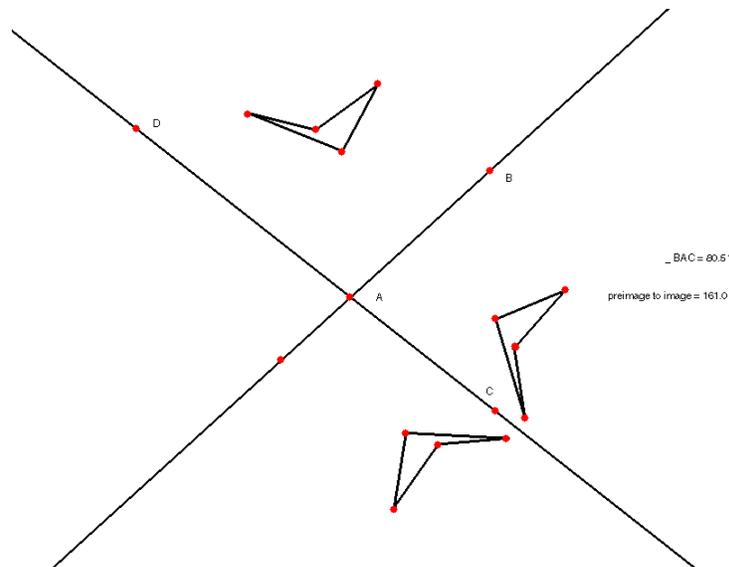

Figure A.9