

b. (2a,3a)

a. (6,6)

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The figure is a parallelogram because it has two sets of parallel sides. The top side has a slope of  $\frac{6-4}{3-2} = \frac{2}{5}$ , and the slope of the bottom side is  $\frac{3-5}{1-4} = \frac{2}{5}$ . Since the slopes are equal, the lines are parallel. The left side has a slope of  $\frac{4-5}{2-4} = \frac{9}{2}$ , and the right side has slope  $\frac{6-3}{3-1} = \frac{9}{2}$ . Since the slopes are equal, the lines are parallel.

d.  $a = z$

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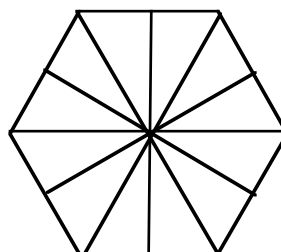
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d.  $72^\circ$

The sum of the measures of the exterior angles of a convex polygon, one at each vertex, is  $360^\circ$ . Since this is a regular polygon, the exterior angles are congruent to one another. Therefore,  $m \angle 1 = \frac{360}{5} = 72^\circ$ .

6 lines of symmetry



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