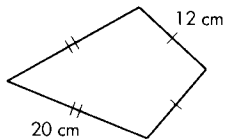


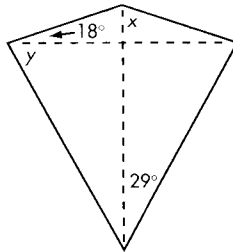
Kites and Trapezoids

Use your new conjectures to solve the following exercises. The figures in Exercises 1-3 are kites. The figures in Exercises 4-6 are isosceles trapezoids.

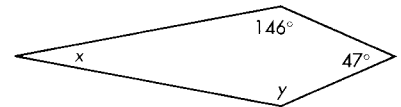
1. Perimeter = -?-



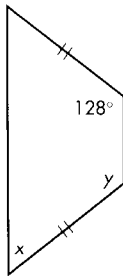
2. $x = -?-$
 $y = -?-$



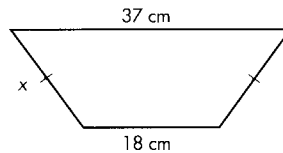
3. $x = -?-$
 $y = -?-$



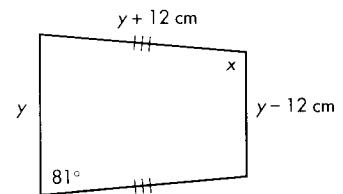
4. $x = -?-$
 $y = -?-$



5. $x = -?-$
Perimeter = 85 cm



6. $x = -?-$
 $y = -?-$
Perimeter = 164 cm



7. Write the converse of the following statement: If exactly one diagonal bisects a pair of opposite angles of a quadrilateral, then the quadrilateral is a kite. Is the converse true? If not true, sketch a counterexample. Is the original statement true? If not true, sketch a counterexample.

8. Trace the figure below. Calculate each lettered angle measure.

