Name: _____ Date: _____ Period: _____

Geometry Bundle 8 Test REVIEW

Match the formulas.

_____ 1. sum of the interior angles of a polygon

_____ 2. sum of the exterior angles of a polygon

_____ 3. measure of one interior angle of a regular polygon

_____ 4. measure of one exterior angle of a regular polygon

_____ 5. number of diagonals drawn from one vertex

_____ 6. number of triangles formed by diagonals from one vertex

A. $n - 3$

B. $n - 2$

C. $(n - 2)(180)$

D. $\frac{(n-2)(180)}{n}$

E. 360

F. $\frac{360}{n}$

7. What is the sum of the measure of the interior angles of a 19-gon?

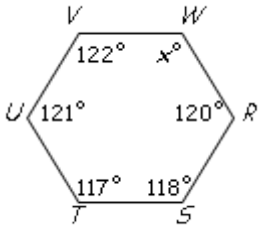
8. What is the measure of one interior angle of a regular 24-gon?

9. What is the sum of the measures of the exterior angles of any polygon?

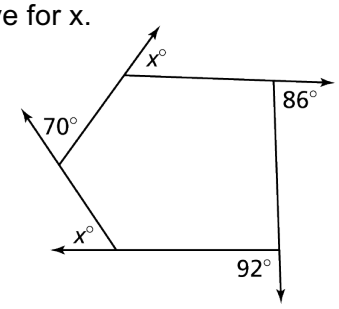
10. What is the measure of one exterior angle of a regular 18-gon?

11. The sum of the measures of the interior angles of a convex polygon is 3780°. Classify the polygon by the number of sides.

12. Find the value of x.



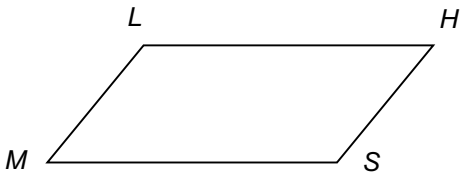
13. Solve for x.



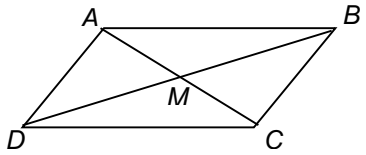
14. If the measure of one of the angles of a rectangle is (6x+24)°, then find the value of x.

15. If the length of one of the diagonals of a rectangle is 52 inches, then what is the length of the other?

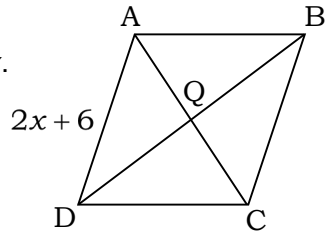
16. In parallelogram *MLHS*, m∠*M* = (8*x*–20)° and m∠*L* = (5*x*+10)°. Find the value of *x*.



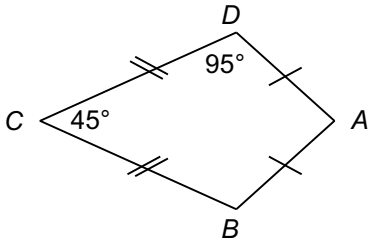
17. In parallelogram *ABCD*, the two diagonals intersect each other at point *M*. If *AC* = 25 inches, then what is the length of $\overline{MC}$?



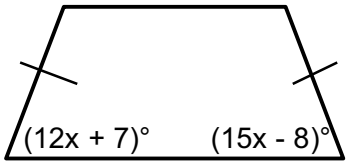
18. Rhombus ABCD has a perimeter of 72 inches. Find the value of *x*.



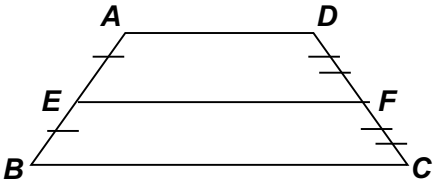
19. Find the measure of ∠*A* and ∠*B*.



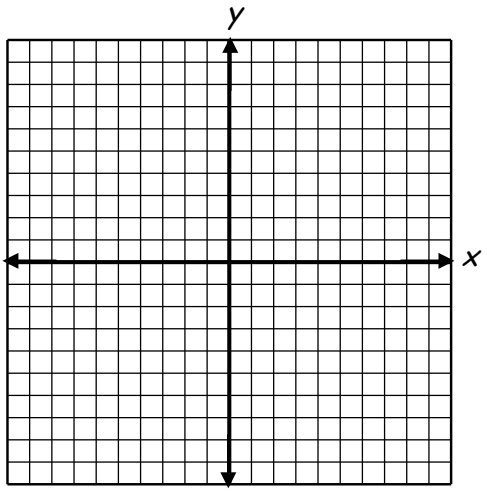
20. Find the value of x for the following isosceles trapezoid.



21. If *AD* = 3 and *BC* = 17, find *EF*.



22. Figure *ABCD* has vertices: *A* (4, 6); *B* (8, 7); *C* (7, 3); *D* (3, 2). What is the best name for figure *ABCD*?



Be sure you know and can use all the properties of special quadrilaterals*
Review previous homework and quizzes