

Hanes Magnet Math Club Worksheet 03 Fall 2017

Warm-up problem: mental math

Is 2017 a prime number?

Club Problems

- (1) If the area of a circle is 1, what is the length of its circumference?

- (2) Among all the triangles with the same base and height, which one has the shortest perimeter? Why?

- (3) If an equilateral triangle's area is 1, what is its perimeter?

- (4) If a rectangle's area is 1, what is the shortest possible perimeter? Why?

- (5) If a triangle's area is one, what is the shortest possible perimeter? Why?

- (6) If a Pentagon's area is 1, what is the shortest possible perimeter? Why?

- (7) If a Hexagon's area is 1, what is the shortest possible perimeter? Why?

- (8) If the area of an n-side polygon (called n-gon) is 1, what is the shortest possible perimeter? Why?

- (9) If a right triangle's area is 1, what is the shortest possible perimeter? Why?