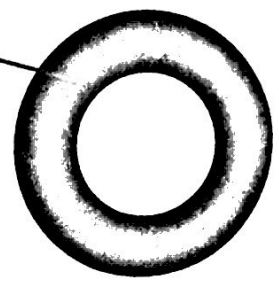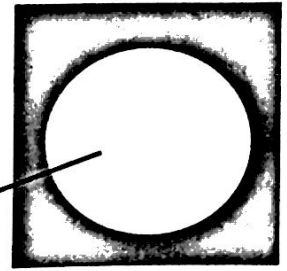## Cubs Logo

14 cm

14cm 8cm

Top box

What would be the area of this white circle if they messed up the logo and forgot to print the red letters? The circumference of the circle is ~~14cm.~~ 11π cm.

What is the area of this blue donut shape if the area of the square is ~~49cm²~~ $196 cm^2$

$7^2\pi = 49\pi$

~~49cm²~~ $49\pi cm^2 = $ ~~~~

$\frac{95}{}$ $= $ ~~~~ $58.9 cm^2$

St. Louis Logo

9cm

Cardinals box

The red lettering has a composite area of 34cm². The white border has a composite area of 14 cm².

Find the probability that if you throw a dart at the Cardinal's 8 cm by 9 cm logo that it will...
- Land on the red area?

$$\frac{34 cm^2}{72 cm^2} = \boxed{47.2\%}$$

- Land on the blue area?

$$\frac{34 cm^2}{72 cm^2} = \frac{1}{3} = \boxed{33.33\%}$$

Field problem

Using right triangles and the dimensions of the field, I created the following sketch to resemble U.S. Cellular. Using these dimensions, find the area of the field. Find the probability that a ball hit in the air lands in between left-center and right-center.

68547.45   16.6%

Dimensions: Left field: 330 feet; left-center: 377 feet; right-center: 372 feet; right field: 335 feet

182.3ft.   161.2ft.

161.7ft.

377ft.   372ft.

330 ft   335ft.
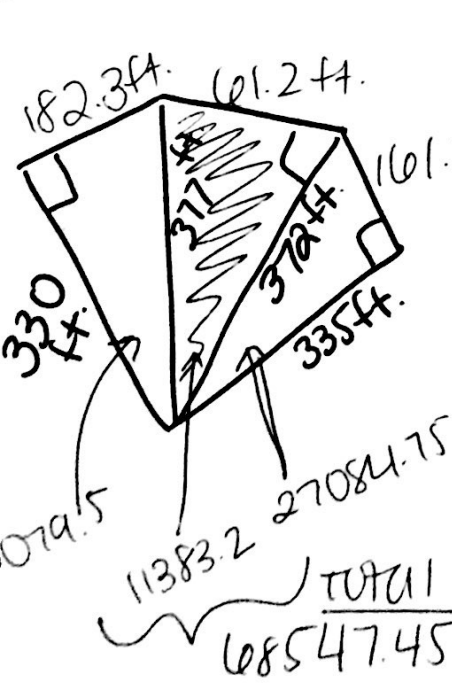
$330^2 + X^2 = 377^2$
$X = 182.3$

$372^2 + X^2 = 377^2$

$335^2 + X^2 = 372^2$
$\frac{-335^2 \qquad -335^2}{X = 161.7}$

$\frac{113832}{68547.45} = .166$

$\boxed{16.6\%}$

30795

11383.2   27084.75

Total Area
68547.45

Name: Key

Period: 2 6 8   **Date:** 4/4/17

The infield of a baseball diamond has the dimensions of 90 ft by 90 ft. A softball diamond is smaller with an infield of only 60 ft. by 60 ft.

Side Lengths of Baseball Infield=	Perimeter of Baseball Infield=	Area of Baseball Infield=
90ft	$90 \times 4 = 360ft.$	$90 \times 90 = 8100 ft^2$
Side Lengths of Softball Infield=	Perimeter of Softball Infield=	Area of Softball Infield=
60ft	$60 \times 4 = 240ft.$	$60 \times 60 = 3600 ft^2$
Simplified Ratio of Side Lengths-	Simplified Ratio of Perimeters-	Simplified Ratio of Areas-
$3:2$	$3:2$	$9:4$

★ ratio squared ★

Dexter Fowler is running down the first base line, but 1.5 seconds on his way to the base, he twists his ankle. He hops towards first base for 1.7 seconds, and then walks the rest of the way. In total, it took him 7 seconds to get to first base.

7 seconds

RUN | HOP | WALK
1.5 sec. | 1.7 sec. | 3.8 sec.
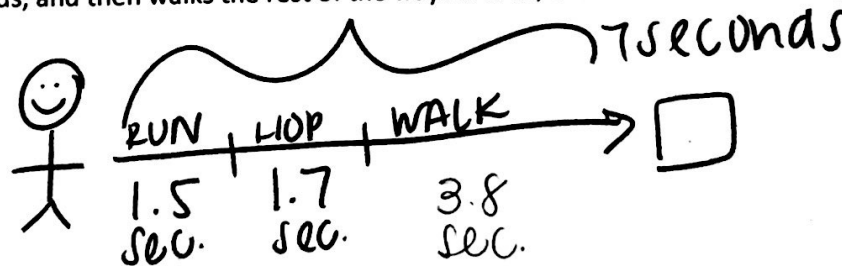
You are the fan at the game, but are distracted by your delicious hot dog. What is the probability that when you look up you see Fowler walking? Running or hopping?

$$\frac{3.8}{7} = 54.3\%$$

$$\frac{1.5+1.7}{7} = \frac{3.2}{7} = 45.7\%$$

A Ball is hit 160 ft., but you do not know which direction. What is the probability that it is in play? (Hint: What shape are we talking about? How do we find probability in that shape?)

$$\frac{90°}{360°} = \frac{1}{4}$$

160ft.   160ft.   160ft.