

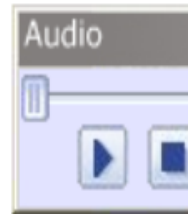
What is the value of $4t^2 + 6r - tr$ when $t = -3$ and $r = 5$?

$$4(-3)^2 + (6)5 - (-3)5$$

$$-3 \times -3$$
$$4 \times 9 + 6 \times 5 - -3 \times 5$$

$$36 + 30 + 15$$

$$81$$



Type your

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A S

The equation $y = 12x + 60$ can be used to estimate y , the height of a tree in centimeters x months after it is planted. When a tree is 150 cm tall, how long ago was the tree planted?



- A. 7.5 months
- B. 10.8 months
- C. 17.5 months
- D. 78.0 months

$$y = 12x + 60$$
$$\downarrow$$
$$150 = \underline{12x + 60}$$

Diagram illustrating the algebraic steps to solve for x in the equation $150 = 12x + 60$:

1. Start with x .

2. Multiply x by 12 (indicated by $\cdot 12$ above the arrow) to get 90.

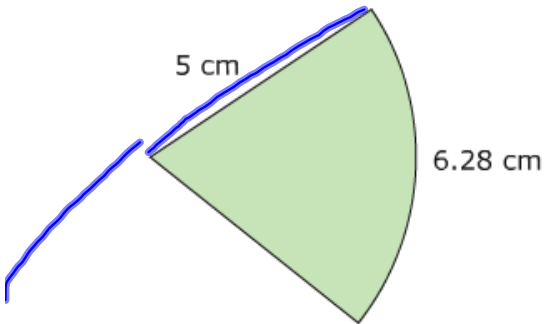
3. Add 60 to 90 (indicated by $+60$ above the arrow) to get 150.

Reverse steps to solve for x :

4. Subtract 60 from 150 (indicated by -60 below the arrow) to get 90.

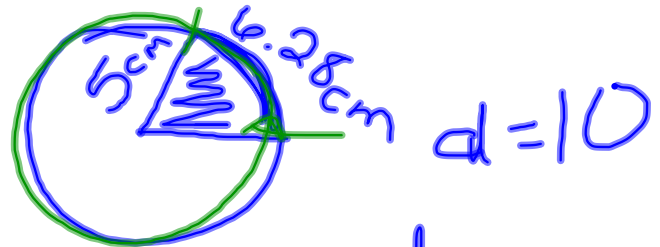
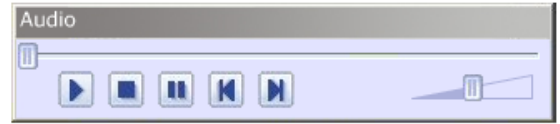
5. Divide 90 by 12 (indicated by $\div 12$ below the arrow) to get x .

A sector of a circle is shown.



What is the area of the sector?
(Use 3.14 for π .)

- A. 12.5 cm²
- B. 15.7 cm²
- C. 31.4 cm²
- D. 78.5 cm²



$$C = \pi \cdot d$$
$$C = 3.14 \times 10$$
$$C = 31.4$$

$$\frac{6.28}{31.4} = \frac{1}{5}$$

$\frac{1}{5}$ of the circle

$$A = \pi \cdot r^2$$
$$A = 3.14 \times 5^2$$
$$A = 78.5$$

$$\frac{78.5}{5} = 15.7$$