

Patterns, Equations, and Graphs Assignment

Tell whether the given equation has the ordered pair as a solution.

1. $x = y + 6$ $(3, -3)$ 2. $y - 6 = 3x$ $(1, 9)$

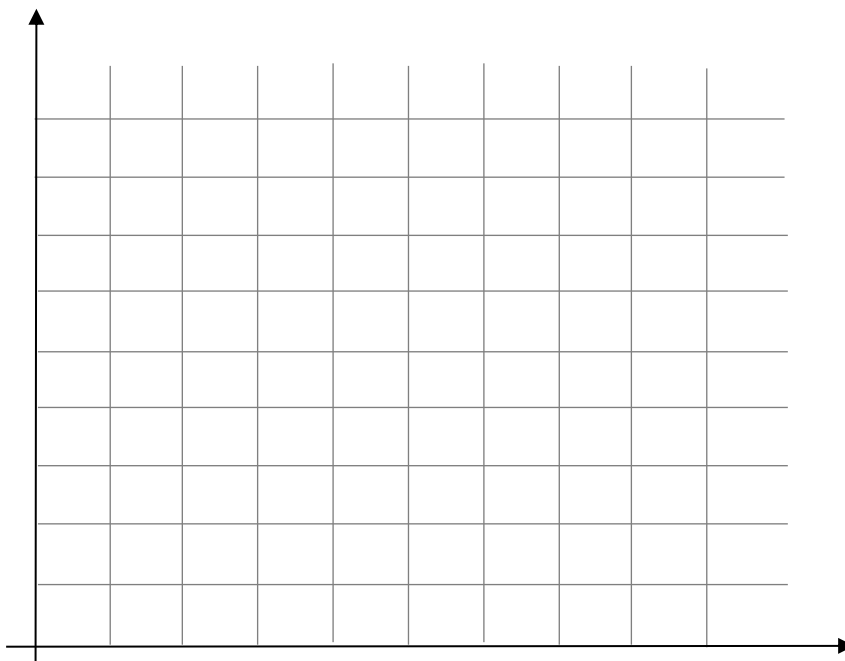
3. $y - 2x = 3$ $(5, 12)$ 4. $y = 2x + 3$ $(-3, -3)$

5. $y - 6x = 2$ $(2, 13)$ 6. $y = x - 2$ $(2, 1)$

7. $x + 7 = y - 3$ $(3, 12)$ 8. $x - 8 = 3y$ $(11, 1)$

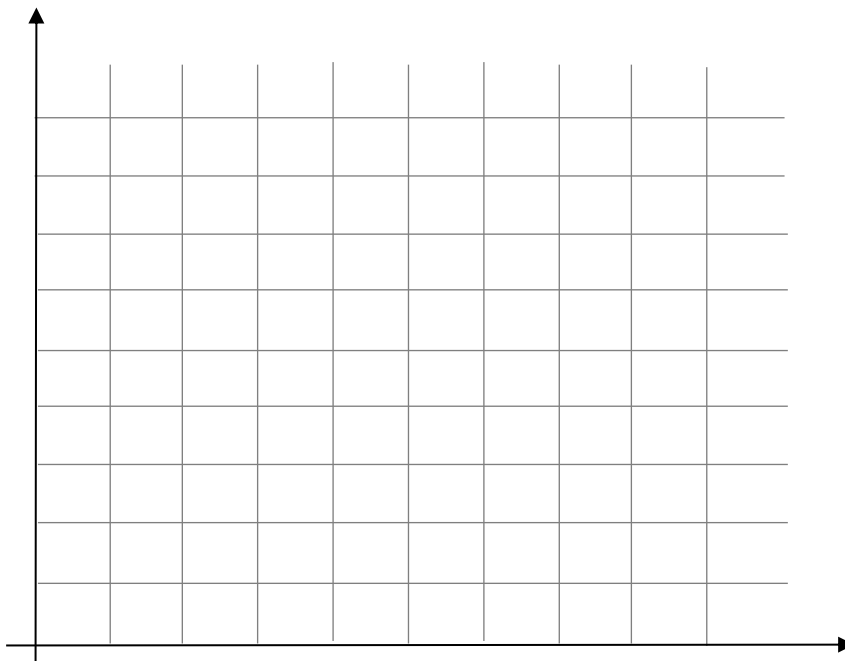
Use a table, an equation, and a graph to represent each relationship.

9. Susy makes 3 bracelets per hour.



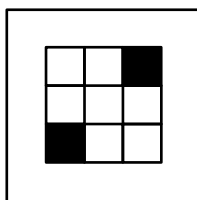
Patterns, Equations, and Graphs Assignment

10. Tina earns \$2.5 for every hour babysitting.

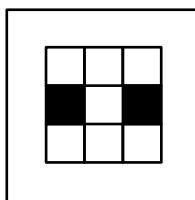


Predict the next figure in the each sequence.

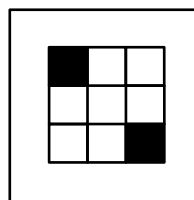
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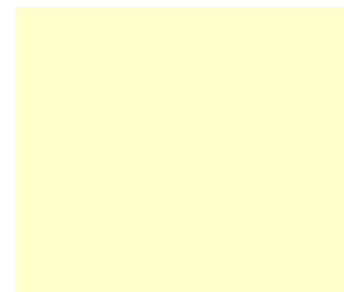
i.



ii.



iii.



iv.

Patterns, Equations, and Graphs Assignment

ANSWER

Tell whether the given equation has the ordered pair as a solution.

1. $x = y + 6$ (3, -3)

$$\begin{aligned}x &= y + 6 \\ 3 &= -3 + 6 \\ 3 &= 3\end{aligned}$$

2. $y - 6 = 3x$ (1, 9)

$$\begin{aligned}y - 6 &= 3x \\ 9 - 6 &= 3(1) \\ 3 &= 3\end{aligned}$$

3. $y - 2x = 3$ (5, 12)

$$\begin{aligned}y - 2x &= 3 \\ 12 - 2(5) &= 3 \\ 12 - 10 &= 3 \\ 2 &\neq 3\end{aligned}$$

4. $y = 2x + 3$ (-3, -3)

$$\begin{aligned}y &= 2x + 3 \\ -3 &= 2(-3) + 3 \\ -3 &= -6 + 3 \\ -3 &= -3\end{aligned}$$

5. $y - 6x = 2$ (2, 13)

$$\begin{aligned}y - 6x &= 2 \\ 13 - 6(2) &= 2 \\ 13 - 12 &= 2 \\ 1 &\neq 2\end{aligned}$$

6. $y = x - 2$ (2, 1)

$$\begin{aligned}y &= x - 2 \\ 1 &= 2 - 2 \\ 1 &\neq 0\end{aligned}$$

7. $x + 7 = y - 3$ (3, 12)

$$\begin{aligned}x + 7 &= y - 3 \\ 3 + 7 &= 12 - 3 \\ 10 &\neq 9\end{aligned}$$

8. $x - 8 = 3y$ (11, 1)

$$\begin{aligned}x - 8 &= 3y \\ 11 - 8 &= 3(1) \\ 3 &= 3\end{aligned}$$

Patterns, Equations, and Graphs Assignment

Use a table, an equation, and a graph to represent each relationship.

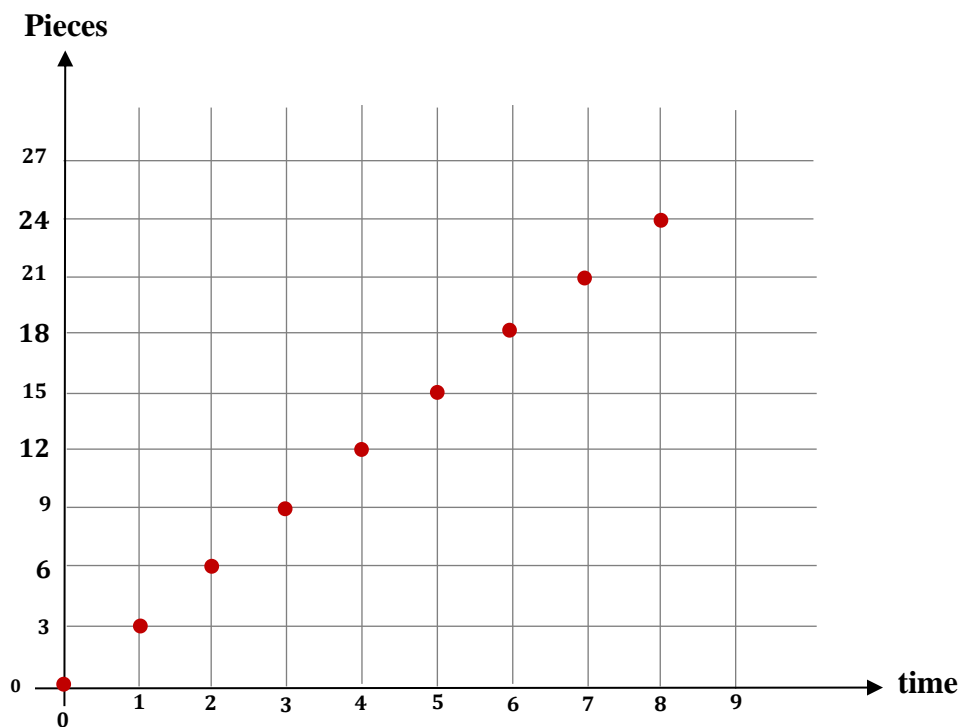
9. Susy makes 3 bracelets per hour.

$$p = 3(t)$$

Where: p = Total number of bracelets made

t = number of hours

t (hour)	p (pcs)
0	0
1	3
2	6
3	9
4	12
5	15
6	18
7	21
8	24



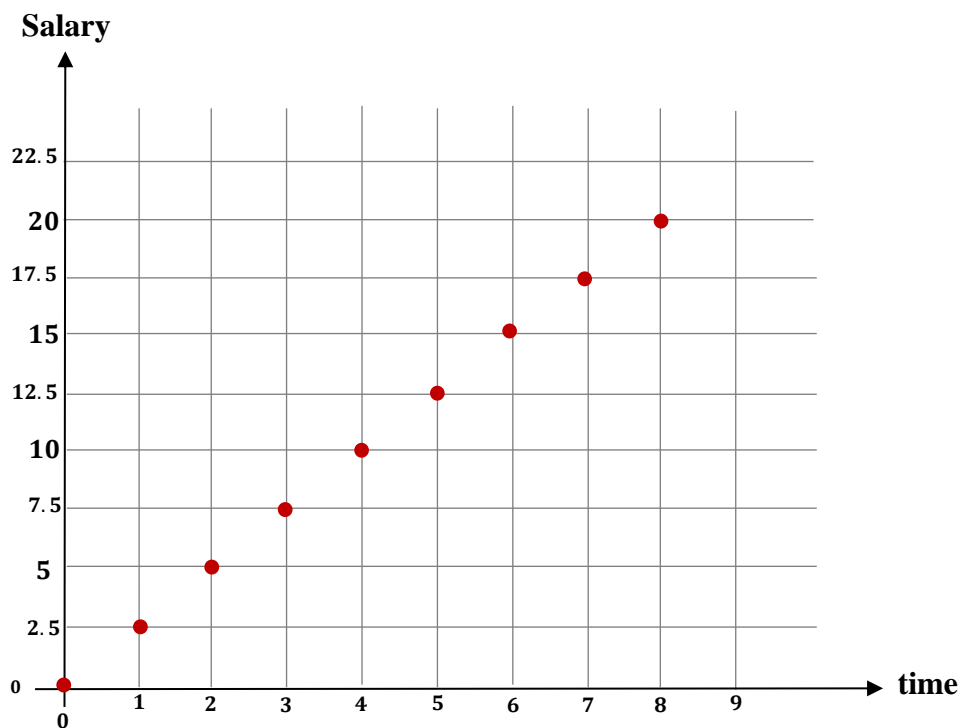
Patterns, Equations, and Graphs Assignment

10. Tina earns \$2.5 for every hour babysitting.

$$s = 2.5(t)$$

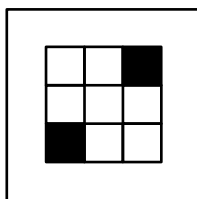
Where: s = Total salary
 t = number of hours

t (hour)	s (\$)
0	0
1	2.5
2	5
3	7.5
4	10
5	12.5
6	15
7	17.5
8	20

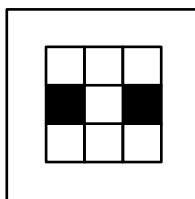


Predict the next figure in the each sequence.

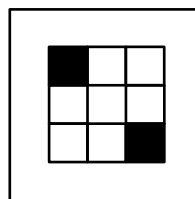
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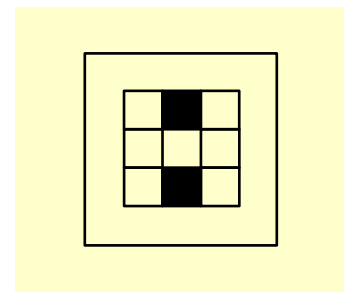
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