Identifizieren von Schnittpunkten mit Gleichungen

Name:

Bestimmen Sie für jedes Gleichungssystem den Schnittpunkt in einem Graphen.

1) $\begin{cases} y = 0.5x - 2 \\ y = 1.75x + 3 \end{cases}$

2) $\begin{cases} y = 1.8x + 9 \\ y = 0.2x - 7 \end{cases}$

3) $\begin{cases} y = -0.75x - 8 \\ y = 2.75x + 6 \end{cases}$

4) $\begin{cases} y = 2.75x + 8 \\ y = -1.25x - 8 \end{cases}$

5) $\begin{cases} y = -0.4x + 6 \\ y = -0.1x + 3 \end{cases}$

6) $\begin{cases} y = 0.5x + 4 \\ y = 0.9x + 0 \end{cases}$

7) $\begin{cases} y = -4.75x + 9 \\ y = -1.75x - 3 \end{cases}$

8) $\begin{cases} y = -1.5x + 6 \\ y = 1.5x + 0 \end{cases}$

9) $\begin{cases} y = 0.2x - 1 \\ y = 0.8x + 5 \end{cases}$

10) $\begin{cases} y = 2.5x + 7 \\ y = -1.25x - 8 \end{cases}$

Antworten

1. _____
2. _____
3. _____
4. _____
5. _____
6. _____
7. _____
8. _____
9. _____
10. _____

1-10	90	80	70	60	50	40	30	20	10	0

Identifizieren von Schnittpunkten mit Gleichungen Name: **Lösungsschlüssel**

Bestimmen Sie für jedes Gleichungssystem den Schnittpunkt in einem Graphen.

1) $\begin{cases} y = 0.5x - 2 \\ y = 1.75x + 3 \end{cases}$

0.5x- 2 = 1.75x+3
-1.25x = 5
1x = -4
y = (0.5×-4)- 2
y = (1.75×-4)+3

2) $\begin{cases} y = 1.8x + 9 \\ y = 0.2x - 7 \end{cases}$

1.8x+9 = 0.2x- 7
1.6x = -16
1x = -10
y = (1.8×-10)+9
y = (0.2×-10)- 7

3) $\begin{cases} y = -0.75x - 8 \\ y = 2.75x + 6 \end{cases}$

-0.75x- 8 = 2.75x+6
-3.5x = 14
1x = -4
y = (-0.75×-4)- 8
y = (2.75×-4)+6

4) $\begin{cases} y = 2.75x + 8 \\ y = -1.25x - 8 \end{cases}$

2.75x+8 = -1.25x- 8
4x = -16
1x = -4
y = (2.75×-4)+8
y = (-1.25×-4)- 8

5) $\begin{cases} y = -0.4x + 6 \\ y = -0.1x + 3 \end{cases}$

-0.4x+6 = -0.1x+3
-0.3x = -3
1x = 10
y = (-0.4×10)+6
y = (-0.1×10)+3

6) $\begin{cases} y = 0.5x + 4 \\ y = 0.9x + 0 \end{cases}$

0.5x+4 = 0.9x+0
-0.4x = -4
1x = 10
y = (0.5×10)+4
y = (0.9×10)+0

7) $\begin{cases} y = -4.75x + 9 \\ y = -1.75x - 3 \end{cases}$

-4.75x+9 = -1.75x- 3
-3x = -12
1x = 4
y = (-4.75×4)+9
y = (-1.75×4)- 3

8) $\begin{cases} y = -1.5x + 6 \\ y = 1.5x + 0 \end{cases}$

-1.5x+6 = 1.5x+0
-3x = -6
1x = 2
y = (-1.5×2)+6
y = (1.5×2)+0

9) $\begin{cases} y = 0.2x - 1 \\ y = 0.8x + 5 \end{cases}$

0.2x- 1 = 0.8x+5
-0.6x = 6
1x = -10
y = (0.2×-10)- 1
y = (0.8×-10)+5

10) $\begin{cases} y = 2.5x + 7 \\ y = -1.25x - 8 \end{cases}$

2.5x+7 = -1.25x- 8
3.75x = -15
1x = -4
y = (2.5×-4)+7
y = (-1.25×-4)- 8

Antworten

1. **(-4 , -4)**
2. **(-10 , -9)**
3. **(-4 , -5)**
4. **(-4 , -3)**
5. **(10 , 2)**
6. **(10 , 9)**
7. **(4 , -10)**
8. **(2 , 3)**
9. **(-10 , -3)**
10. **(-4 , -3)**

1-10	90	80	70	60	50	40	30	20	10	0