

Lineare Gleichungssysteme

Aufgaben

$$\begin{array}{l} 1. \quad \left| \begin{array}{l} 5x + 4y - 3z = -6 \\ -3x + 1y + 4z = 1 \\ 4x + 4y + 5z = 29 \end{array} \right| \end{array}$$

$$\begin{array}{l} 2. \quad \left| \begin{array}{l} -5x + 2y + 1z = 5 \\ -1x + 2y - 5z = 13 \\ 5x + 2y + 1z = -5 \end{array} \right| \end{array}$$

$$\begin{array}{l} 3. \quad \left| \begin{array}{l} 1x - 1y + 5z = -21 \\ 4x + 4y - 3z = 48 \\ -1x - 4y + 2z = -32 \end{array} \right| \end{array}$$

$$\begin{array}{l} 4. \quad \left| \begin{array}{l} 1x - 3y + 5z = -5 \\ -2x - 2y + 4z = -20 \\ -2x + 5y + 3z = -50 \end{array} \right| \end{array}$$

$$\begin{array}{l} 5. \quad \left| \begin{array}{l} -2x - 3y + 4z = 28 \\ 1x - 5y - 1z = 17 \\ 3x + 3y + 3z = 9 \end{array} \right| \end{array}$$

$$\begin{array}{l} 6. \quad \left| \begin{array}{l} -2x + 2y - 1z = 0 \\ -3x - 3y - 3z = 33 \\ 2x - 1y + 3z = -9 \end{array} \right| \end{array}$$

$$\begin{array}{l} 7. \quad \left| \begin{array}{l} 5x - 1y - 2z = 24 \\ 2x - 1y + 5z = 1 \\ -4x + 2y - 4z = -14 \end{array} \right| \end{array}$$

$$\begin{array}{l} 8. \quad \left| \begin{array}{l} -5x + 4y + 3z = -30 \\ -2x - 2y - 4z = 18 \\ -5x - 2y + 3z = -6 \end{array} \right| \end{array}$$

$$\begin{array}{l} 9. \quad \left| \begin{array}{l} -2x - 2y - 3z = 3 \\ -3x + 3y + 4z = 17 \\ 1x - 5y - 3z = 6 \end{array} \right| \end{array}$$

$$\begin{array}{l} 10. \quad \left| \begin{array}{l} 2x + 4y - 1z = 17 \\ 3x + 1y - 4z = 8 \\ 1x - 4y + 5z = -4 \end{array} \right| \end{array}$$

Lösungen

$$L = \{(5|-4|5)\}$$

$$L = \{(-1|1|-2)\}$$

$$L = \{(4|5|-4)\}$$

$$L = \{(5|-5|-5)\}$$

$$L = \{(2|-4|5)\}$$

$$L = \{(-4|-5|-2)\}$$

$$L = \{(3|-5|-2)\}$$

$$L = \{(1|-4|-3)\}$$

$$L = \{(-4|-5|5)\}$$

$$L = \{(3|3|1)\}$$