

1 解答 (1) 7 (2) $\frac{9a+5b}{4}$ (3) $2\sqrt{3}$ (4) $x=5$ (5) $x=-1, y=6$

(6) $x=-8\pm\sqrt{2}$

$$\begin{aligned} (1) \quad -3^2 \times \frac{1}{9} + 8 &= -9 \times \frac{1}{9} + 8 \\ &= -1 + 8 = 7 \end{aligned}$$

$$\begin{aligned} (2) \quad \frac{5a-b}{2} - \frac{a-7b}{4} &= \frac{2(5a-b)}{2 \times 2} - \frac{a-7b}{4} \\ &= \frac{10a-2b-(a-7b)}{4} \\ &= \frac{10a-2b-a+7b}{4} = \frac{9a+5b}{4} \end{aligned}$$

$$\begin{aligned} (3) \quad 3 \div \sqrt{6} \times \sqrt{8} &= \frac{3 \times \sqrt{8}}{\sqrt{6}} \\ &= \frac{3 \times \sqrt{4}}{\sqrt{3}} \\ &= \frac{6}{\sqrt{3}} = 2\sqrt{3} \end{aligned}$$

$$\begin{aligned} (4) \quad -4x+2 &= 9(x-7) \\ -4x+2 &= 9x-63 \\ -13x &= -65 \\ x &= 5 \end{aligned}$$

$$\begin{aligned} (5) \quad \begin{cases} 5x+y=1 \\ -x+6y=37 \end{cases} \\ \quad \quad \quad 30x+6y=6 \\ -) \quad -x+6y=37 \\ \hline \quad \quad \quad 31x=-31 \\ \quad \quad \quad x=-1 \\ \quad \quad \quad 5 \times (-1) + y = 1 \\ \quad \quad \quad -5 + y = 1 \\ \quad \quad \quad y = 6 \end{aligned}$$

$$\begin{aligned} (6) \quad (x+8)^2 &= 2 \\ x+8 &= \pm\sqrt{2} \\ x &= -8 \pm \sqrt{2} \end{aligned}$$