



Logic

1 $\bigcirc + \blacklozenge = 24$
 $\blacklozenge = \bigcirc + \bigcirc$
 $\bigcirc = ? \quad \blacklozenge = ?$

2 $\bigcirc + \bigcirc + \bigcirc + \square + \square = 41$
 $\bigcirc + \square = 16$
 $\bigcirc = ? \quad \square = ?$

3 $\blacklozenge + \blacksquare = 48$
 $\blacksquare = \blacklozenge + \blacklozenge + \blacklozenge$
 $\blacklozenge = ? \quad \blacksquare = ?$

4

$$\bullet + \blacktriangle = 28$$

$$\bullet + \bullet + \blacktriangle + \blacktriangle + \blacktriangle = 62$$

$$\blacktriangle = ? \quad \bullet = ?$$

Solutions:

- $$\begin{aligned} \circ + \circ + \circ + \circ &= 24 \\ \circ &= 24 \div 4 \\ &= 6 \\ \diamond + 8 &= 16 \\ \diamond &= 16 - 8 \\ &= 8 \\ \circ + 16 + 16 &= 41 \\ \circ &= 41 - 16 - 16 \\ &= 9 \end{aligned}$$
- $$\begin{aligned} \square &= 9 \\ 16 - 9 &= 7 \end{aligned}$$

- $$\begin{aligned} \diamond + \diamond + \diamond + \diamond &= 48 \\ \diamond &= 48 \div 4 \\ &= 12 \\ \square - 12 &= 48 \\ \square &= 48 + 12 \\ &= 36 \end{aligned}$$
- $$\begin{aligned} \blacktriangledown + \blacktriangledown &= 62 \\ \blacktriangledown &= 62 \div 2 \\ &= 31 \end{aligned}$$
- $$\begin{aligned} \bullet &= 28 - 6 \\ &= 22 \end{aligned}$$