

算数オンライン塾 10月6日の問題 解説

(1)

$$A \div 4 = 1 \text{ から } A = 4 \quad 4 \times 4 - 1 = 15 \text{ が } B$$

(答え) A 4 B 15

(2) $4 \times C = D$ $D \times 4 = C + 1$ $D \times 4 = 16 \times C$ だから

$$16 \times C = C + 1 \quad 15 \times C = 1 \text{ なので } C = \frac{1}{15} \quad D = \frac{4}{15}$$

(答え) C $\frac{1}{15}$ D $\frac{4}{15}$

(3) $E \times 4 = 1 + 2 + 3 + F \rightarrow E \times 4 = 6 + F \rightarrow E = 1.5 + \frac{1}{4} \times F$

$$F \times 4 = E + 4 + 5 + 6 \rightarrow F \times 4 = E + 15$$

から

$$F \times 4 = 1.5 + \frac{1}{4} \times F + 15 \quad \frac{15}{4} \times F = \frac{33}{2} \quad F = \frac{33}{2} \times \frac{4}{15} = 4.4 \quad E = 2.6$$

(答え) E 2.6 F 4.4

(4) $4 \times G = 1 + H$

$$4 \times H = G + I + J$$

$$4 = G + I$$

$$4 \times I = 1 + H$$

から $I = G = 2$ $H = 7$ $7 \times 4 - 2 - 2 = 24$ が J

(答え) G 2 H 7 I 2 J 24

(5) $4 \times K = 12 + L + M \cdots \textcircled{1}$

$$4 \times M = 6 + K + N \cdots \textcircled{2}$$

$$4 \times L = 10 + K + N \cdots \textcircled{3}$$

$$4 \times N = 4 + L + M \cdots \textcircled{4}$$

$\textcircled{2}$ と $\textcircled{3}$ の差から $L = M + 1 \cdots \textcircled{5}$ $\textcircled{1}$ と $\textcircled{4}$ の差から $K = N + 2 \cdots \textcircled{6}$

$\textcircled{5}$ を $\textcircled{4}$ に入れると $4 \times N = 4 + M + 1 + M = 2 \times M + 5$ から $N = \frac{1}{2} \times M + \frac{5}{4} \cdots \textcircled{7}$

$\textcircled{6}$ を $\textcircled{2}$ に入れると $4 \times M = 6 + N + 2 + N = 2 \times N + 8 \cdots \textcircled{8}$

$\textcircled{7}$ を $\textcircled{8}$ に入れて、 $4 \times M = M + 2.5 + 8 = M + 10.5$ $3 \times M = 10.5$ $M = 3.5$

$$N = 3 \quad L = 4.5 \quad K = 5$$

(答え) K=5 L=4.5 M=3.5 N=3