

نام و نام خانوادگی: پاسخنامه تشریحی تکلیف شماره ۱۳ ... کلاس ۱۰ A

$$a_1 = 40 \quad d = \frac{41 - 40}{4 - 1} = 1$$

$$a_4 = 41$$

$$a_n = 4n + 36$$

$$4n + 36 = 40$$

$$4n = 4$$

$$n = 1$$

$$d = 1$$

$$a_1 = 40$$

$$a_n = 4n$$

$$a_n = \frac{a_n - a_1}{d} + 1$$

$$\frac{4n - 40}{1} + 1 = 4n - 39 = 4n$$

$$a_{n+1} + a_{n+2} + a_{n+3} = -4n + 12$$

$$a_1 = 4 \Rightarrow d = -2$$

$$a_n = -2n + 4$$

$$a_1 \rightarrow -2 + 4 = 2$$

$$a_{14} \rightarrow -28 + 4 = -24$$

$$a_1 + a_{14} = 2 - 24 = -22$$

$$a_1 - a_3 = a_{13} - a_1$$

$$2^{x+1} - 2^{x+1} = 2^{2x} - 2^{x+1} \rightarrow 2^{x+1} = 2^{2x} - 2^{x+1}$$

$$2^{2x} - 2^{x+1} - 2^{x+1} = 0$$

$$2^{2x} - 2^{x+1} = 0$$

$$a = \frac{2 \pm \sqrt{4}}{2} = 1, 2$$

$$a_1 = 2$$

$$a_{13} = 16$$

$$a_1 + a_{13} = 18$$

$$t_{12} - t_{10} = 0$$

$$t_{12} + t_{10} = 20$$

$$2t_{12} = 20 \quad t_{12} = 10$$

$$t_{10} = 10$$

$$d = 10$$

$$a_n = 10n - 10 \quad 10 \times 11 - 10 = 110$$

$$\begin{aligned} S_{ar} &\rightarrow \omega a + \omega d \rightarrow 1 & 1\omega a + r\omega d &= \omega a + r\omega d \rightarrow 1\omega a = \omega d \\ S_{br} &\rightarrow \omega a + r\omega d \rightarrow r & a_1 &= \frac{1}{r}d \\ & & d &= r\omega a_1 \\ & & a_r &= r\omega a + 1 \\ & & \frac{a_r}{a_1} &= r \checkmark \end{aligned}$$

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$$\begin{aligned} t_q^r - t_\omega^r &\rightarrow (t_q - t_\omega)(t_q + t_\omega) = (t_v + r\omega d - (t_v - r\omega d))(t_v + r\omega d + t_v - r\omega d) \\ r\omega d \times r + t_v &\rightarrow t_v - r\omega d + 1\omega. \\ r\omega d = 1\omega & \quad d = \omega \end{aligned}$$

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$$\frac{r + t_v \times r\omega}{t_v} = \boxed{\frac{r\omega}{t_v}} \checkmark$$

$$d = \frac{a_m - a_n}{m - n} \quad \text{و} \quad d = \frac{b - a}{n + 1}$$

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$$\frac{r + \sqrt{r} - r + 1r\sqrt{r}}{1r + 1} = \frac{1r\sqrt{r}}{1r} = \sqrt{r}$$

✓ $\sqrt{r} \leq 1$ ، شیب > 1 ،

$$d = \frac{b - a}{n + 1} = \frac{r - r}{r - 1} = \frac{r\omega}{r - 1} \rightarrow \frac{1\omega}{r - 1}$$

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$$a_n = 11$$

$$11 = r + nd \rightarrow r + \frac{1\omega n}{r - 1} = 11$$

$$9 = \frac{1\omega n}{r - 1} \Rightarrow \boxed{n = 9} \checkmark$$

$$r + a_1v \approx a_n + a_{n+r}$$

$$\begin{aligned} r_{n+r} &= r_0 \\ n &= 1 \end{aligned}$$

$$\frac{a_1}{a_r} = r$$

$$\frac{a_r + rd}{a_r} = r$$

$$ra_r = a_r + rd$$

$$ra_r = rd \quad \checkmark \text{ (نیز) } \rightarrow d = r$$

$$a_r = rd$$

$$a_1 + rd = rd$$

$$a_1 = -d$$

$$r = a_1 + d \rightarrow -d + d = 0$$

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