نام و نام خانوادگی ...کیان پورحسینی... پاسخنامه تشریحی تکلیف شماره ..۲۲.. کلاس ...دهم سیر A...

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$$\frac{4\alpha+\beta^5}{5\beta^2}=\frac{4\alpha}{5\beta^2}+\frac{\beta^3}{5}$$

$P=\alpha\beta=2$

$S=\alpha+\beta=5$

$\alpha=\frac{2}{\beta}$

$$\frac{4\alpha}{5\beta^2}=\frac{4(\frac{2}{\beta})}{5\beta^2}=\frac{8}{5\beta^3}$$

$(\frac{2}{\beta})^3=\alpha^3$

$$\frac{8}{5\beta^3}+\frac{\beta^3}{5}=\frac{1}{5}(\beta^3+\frac{8}{\beta^3})=\frac{1}{5}(\alpha^3+\beta^3)$$

$$\frac{1}{5}(S^3-3PS)$$

$$\frac{1}{5}(125-30)=19$$

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نقاط قرینه هستند بین

$$S=\frac{-b}{a}=2\times\frac{-b}{2a}=2\times 0.75=1.5$$

$$\frac{3-1.5}{2}=\frac{1.5}{2}=\frac{-b}{2a}\Rightarrow 0.75=\frac{-b}{2a}$$

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$$\frac{\sqrt{5}}{|a|}=\frac{4}{3}k=\frac{\sqrt{4k^2-20}}{1}\Rightarrow 4k^2-20=\frac{16}{9}k$$

$$\frac{20}{9}k^2-20=0 \qquad \frac{20}{9}k^2=20$$

$$\frac{k^2}{9}=1\Rightarrow k^2=9 \qquad [\frac{9}{2}]=4$$

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نقاط قرینه اند

$$\frac{3-5}{2}=-1=\frac{-b}{2a}$$

مختصات راس $\Rightarrow(-1,1)$ $\quad \frac{-b}{a}=-2$

$$y=a(x+1)^2+1$$

$$ax^2+2ax+(a+1)$$

$$\alpha\beta=\frac{a+1}{a}=-\frac{1}{2}\Rightarrow a=-\frac{2}{3}$$

$x=0$

$$a(1)^2+1=-\frac{2}{3}+1=\frac{1}{3}$$

عرض از مبدا

$$-\frac{2}{3}x^2-\frac{4}{3}x+(\frac{1}{3})$$

$\alpha+\beta=-2$

$$\alpha^2+\beta^2=(\alpha+\beta)^2-2\alpha\beta$$

$$5=4-2\alpha\beta\Rightarrow\alpha\beta=-\frac{1}{2}$$

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$$x^2-5x-m=0$$

$$x_1=\frac{5+\sqrt{25+4m}}{2}$$

$$x_2=\frac{5-\sqrt{25+4m}}{2}$$

$$5+\sqrt{25+4m}<9$$

$$\sqrt{25+4m}<4$$

$$25+4m<16$$

$$4m<-9$$

$$m<\frac{-9}{4}=-2.25$$

$$m\le -3$$

$$5-\sqrt{25+4m}<9$$

$$\sqrt{25+4m}>-4 \checkmark$$

$$25+4m\ge 0$$

$$4m\ge -25$$

$$m\ge -6.25$$

$$m\ge -6$$

$$-6\le m\le -3$$

عدد صحیح

۴ عدد $\leftarrow -6,-5,-4,-3$

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$\min \Rightarrow m > 0$

$ext\begin{cases} x = \dfrac{-b}{2a} = \dfrac{12}{2m} = \dfrac{6}{m} = \dfrac{6}{3} = 2 \\ y = \dfrac{-\Delta}{4a} = \dfrac{-(144 - 20m^2 + 4m)}{4m} = \dfrac{20m^2 - 4m - 144}{4m} = \dfrac{5m^2 - m - 36}{m} = 2 \end{cases}$

$\Rightarrow 2m = 5m^2 - m - 36 \Rightarrow 5m^2 - 3m - 36 = 0$

$m^2 - 3m - 180$

$(m-15)(m+12)$

$m = \dfrac{15}{5} = 3$ ✓

$m = \dfrac{-12}{5}$ غ ق ق

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$a \quad a \quad \beta$

$a\beta = a^2$

$P = a^2$

$2a - 1 = a^2$

$a^2 - 2a + 1 = 0$

$(a-1)^2 = 0$

$a = 1$

$(2a+2)^2 - 8a + 4 > 0$

$\Delta > 0 \quad 4a^2 + 4 + 8a - 8a + 4 > 0$

$4a^2 + 16 > 0$

$4(a^2 + 4) > 0$

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$x^2 = t \qquad t^2 - 7t - 5 = 0$

$2P^2 - 3SP + 2S = 50 + 105 + 14 = 169$

$S = \dfrac{-b}{a} = 7$

$P = \dfrac{c}{a} = -5$

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$x = \dfrac{-b}{2a} = \dfrac{4}{2k} = \dfrac{2}{k} = \dfrac{2}{2} = 1$

$y = \dfrac{-\Delta}{4a} = \dfrac{-16 - 24k}{4k} = \dfrac{-4 - 6k}{k}$

$\dfrac{-4 - 6k}{k} = -4\left(\dfrac{2}{k}\right) - 4$

$\dfrac{-4 - 6k}{k} = \dfrac{-8 - 4k}{k}$

$-4 - 6k = -8 - 4k$

$2k = 4$

$k = 2$

$y = 2x^2 - 4x - 6$

$y = -4(1) - 4 = -8$

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$-m - x = -mx^2 + mx + 1$

$mx^2 - mx - 1 - m - x = 0$

$mx^2 - (m+1)x - 1 - m = 0$

$\Delta < 0$

$(m+1)^2 - 4(m)(-m-1)$

$(m+1)(m+1+4m) < 0$

$(m+1)(5m+1) < 0$

$m + 1 = 0$

$m = -1$

$5m + 1 = 0$

$m = -\dfrac{1}{5}$

$-1 \qquad -\dfrac{1}{5}$

$+ \quad - \quad +$

$-1 < m < -\dfrac{1}{5}$

$m \in \left(-1, -\dfrac{1}{5}\right)$

۰ عدد صحیح