

Course: SBI Clerk Mains

Subject: : Practice Set

Time:15 Minutes

Published Date: 2ndAugust 2020

Directions (1-5): निम्नलिखित प्रश्नों में दो समीकरण (I) और (II) दिए गए हैं, दोनों समीकरणों को हल करें और उत्तर दीजिए-

I. $4x^2 - 15x - 46 = 0$

II. $6y^2 + 35y + 46 = 0$

Q1.

- (a) यदि $x > y$
- (b) यदि $x \geq y$
- (c) यदि $x < y$
- (d) यदि $x \leq y$
- (e) यदि $x = y$ या संबंध स्थापित नहीं किया जा सकता है

L1Difficulty 3

QTagsQuadratic Inequalities

QCreatorDeepak Rohilla

I. $2x^2 - x - 10 = 0$

II. $2y^2 - y - 21 = 0$

Q2.

- (a) यदि $x > y$
- (b) यदि $x \geq y$
- (c) यदि $x < y$
- (d) यदि $x \leq y$
- (e) यदि $x = y$ या संबंध स्थापित नहीं किया जा सकता है

L1Difficulty 3

QTagsQuadratic Inequalities

QCreatorDeepak Rohilla

I. $x^2 - 3x - 88 = 0$

II. $y^2 + 8y - 48 = 0$

Q3.

- (a) यदि $x > y$
- (b) यदि $x \geq y$
- (c) यदि $x < y$
- (d) यदि $x \leq y$
- (e) यदि $x = y$ या संबंध स्थापित नहीं किया जा सकता है

L1Difficulty 3

QTagsQuadratic Inequalities

QCreatorDeepak Rohilla

I. $2x^2 - 9x + 9 = 0$

Q4. II. $y^2 - 7y + 12 = 0$

- (a) यदि $x > y$
- (b) यदि $x \geq y$
- (c) यदि $x < y$
- (d) यदि $x \leq y$
- (e) यदि $x = y$ या संबंध स्थापित नहीं किया जा सकता है

L1Difficulty 3

QTagsQuadratic Inequalities

QCreatorDeepak Rohilla

I. $4x^2 + 19x + 22 = 0$

Q5. II. $2y^2 + 11y + 15 = 0$

- (a) यदि $x > y$
- (b) यदि $x \geq y$
- (c) यदि $x < y$
- (d) यदि $x \leq y$
- (e) यदि $x = y$ या संबंध स्थापित नहीं किया जा सकता है

L1Difficulty 3

QTagsQuadratic Inequalities

QCreatorDeepak Rohilla

Directions (6-10): निम्नलिखित प्रश्नों में प्रश्नवाचक-चिह्न (?) के स्थान पर क्या अनुमानित मान आएगा-

Q6. $\sqrt{2900} \times \sqrt{498} \div \sqrt{251} = ? \div 8$

- (a) 600
- (b) 670
- (c) 770
- (d) 750
- (e) 730

L1Difficulty 3

QTagsApproximation

QCreatorDeepak Rohilla

Q7. $89.998\% \text{ of } 598.9 + 51.002\% \text{ of } 899.99 - 171.015 = ?$

- (a) 990
- (b) 830
- (c) 910

(d) 870

(e) 980

L1Difficulty 3

QTagsApproximation

QCreatorDeepak Rohilla

Q8.
$$\frac{341}{20.002} \div \frac{511}{30.07} \times \frac{179.909}{49.919} = ?$$

(a) 36

(b) 7.2

(c) 72

(d) 3.6

(e) 1.8

L1Difficulty 3

QTagsApproximation

QCreatorDeepak Rohilla

Q9.
$$8999 \div 90.005 \times 95.998 = ? \times 20.999$$

(a) 420

(b) 320

(c) 540

(d) 525

(e) 457

L1Difficulty 3

QTagsApproximation

QCreatorDeepak Rohilla

Q10.
$$(39.99)^2 - (9.9)^2 - (15.1)^2 = ?$$

Q10.

(a) 1375

(b) 1275

(c) 1100

(d) 1175

(e) 1225

L1Difficulty 3

QTagsApproximation

QCreatorDeepak Rohilla

Directions (11-15): दी गई श्रृंखला में प्रश्नवाचक चिह्न (?) के स्थान पर क्या मान आएगा-

Q11. 2401, 1617, 1225, 1029, 931, ?

(a) 900

(b) 910

(c) 882

(d) 880

(e) 810

L1Difficulty 3

QTagsMISSING SERIES Quant

QCreatorDeepak Rohilla

Q12. 13, 20, 39, 78, 145, ?

(a) 234

(b) 244

(c) 236

(d) 248

(e) 235

L1Difficulty 3

QTagsMISSING SERIES Quant

QCreatorDeepak Rohilla

Q13. 9, 17, 65, 385, 3073, ?

(a) 40704

(b) 73251

(c) 65506

(d) 38521

(e) 30721

L1Difficulty 3

QTagsMISSING SERIES Quant

QCreatorDeepak Rohilla

Q14. 25, 241, 584, 1096, 1825, ?

(a) 2625

(b) 2525

(c) 2725

(d) 2825

(e) 2025

L1Difficulty 3

QTagsMISSING SERIES Quant

QCreatorDeepak Rohilla

Q15. 11, 30, 87, 258, 771, ?

(a) 2610

(b) 2450

(c) 2310

(d) 2730

(e) 2510

L1Difficulty 3

QTagsMISSING SERIES Quant

QCreatorDeepak Rohilla

Solutions

S1. Ans.(b)

$$\text{I. } 4x^2 - 15x - 46 = 0$$

$$\Rightarrow 4x^2 - 23x + 8x - 46 = 0$$

$$\Rightarrow (4x - 23)(x + 2) = 0$$

$$\Rightarrow x = -2, \frac{23}{4}$$

$$\text{II. } 6y^2 + 35y + 46 = 0$$

$$\Rightarrow 6y^2 + 12y + 23y + 46 = 0$$

$$\Rightarrow (y + 2)(6y + 23) = 0$$

$$\Rightarrow y = -2, -\frac{23}{6}$$

Sol. $x \geq y$

S2. Ans.(e)

$$\text{I. } 2x^2 - x - 10 = 0$$

$$\Rightarrow 2x^2 - 5x + 4x - 10 = 0$$

$$\Rightarrow (2x - 5)(x + 2) = 0$$

$$\Rightarrow x = \frac{5}{2}, -2$$

$$\text{II. } 2y^2 - y - 21 = 0$$

$$\Rightarrow 2y^2 - 7y + 6y - 21 = 0$$

$$\Rightarrow (2y - 7)(y + 3) = 0$$

$$\Rightarrow y = \frac{7}{2}, -3$$

Sol. No relation

S3. Ans.(e)

$$\text{I. } x^2 - 3x - 88 = 0$$

$$\Rightarrow (x - 11)(x + 8) = 0$$

$$\Rightarrow x = 11, -8$$

$$\text{II. } y^2 + 8y - 48 = 0$$

$$\Rightarrow (y + 12)(y - 4) = 0$$

$$\Rightarrow y = 4, -12$$

Sol. No relation

S4. Ans.(d)

$$\begin{aligned}
\text{I. } & 2x^2 - 9x + 9 = 0 \\
& \Rightarrow 2x^2 - 6x - 3x + 9 = 0 \\
& \Rightarrow (x - 3)(2x - 3) = 0 \\
& \Rightarrow x = 3, \frac{3}{2} \\
\text{II. } & y^2 - 7y + 12 = 0 \\
& \Rightarrow y^2 - 3y - 4y + 12 = 0 \\
& \Rightarrow (y - 3)(y - 4) = 0 \\
& \Rightarrow y = 3, 4
\end{aligned}$$

Sol. $y \geq x$

S5. Ans.(e)

$$\begin{aligned}
\text{I. } & 4x^2 + 19x + 22 = 0 \\
& \Rightarrow 4x^2 + 8x + 11x + 22 = 0 \\
& \Rightarrow (x + 2)(4x + 11) = 0 \\
& \Rightarrow x = -2, -\frac{11}{4} \\
\text{II. } & 2y^2 + 11y + 15 = 0 \\
& \Rightarrow 2y^2 + 6y + 5y + 15 = 0 \\
& \Rightarrow (y + 3)(2y + 5) = 0 \\
& \Rightarrow y = -3, -\frac{5}{2}
\end{aligned}$$

Sol. No relation

S6. Ans.(a)

$$\begin{aligned}
? & = \sqrt{2900} \times \sqrt{498} \div \sqrt{251} \times 8 \\
& \approx 54 \times 22 \div 16 \times 8 \\
& \approx 600
\end{aligned}$$

Sol.

S7. Ans.(b)

$$\begin{aligned}
? & = 89.998\% \text{ of } 598.9 + 51.002\% \text{ of } 899.99 - 171.015 \\
& \approx 90\% \text{ of } 600 + 51\% \text{ of } 900 - 171.05 \\
& \approx 540 + 459 - 171 \\
& \approx 830
\end{aligned}$$

Sol.

S8. Ans.(d)

$$? = \frac{341}{20.002} \div \frac{511}{30.07} \times \frac{179.909}{49.919} = ?$$

$$\approx \frac{340}{20} \times \frac{30}{510} \times \frac{180}{50}$$

$$\approx 3.6$$

Sol.

S9. Ans. (e)

$$? = 8999 \div 90.005 \times 95.998 \div 20.999$$

$$\approx 9000 \div 90 \times 96 \div 21$$

$$\approx 9600 \div 21$$

$$\approx 457$$

Sol.

S10. Ans.(b)

$$? = (39.99)^2 - (9.9)^2 - (15.1)^2$$

$$= (40)^2 - (10)^2 - (15)^2$$

$$= 1275$$

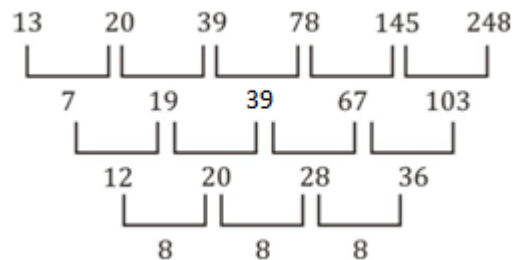
Sol.

S11. Ans.(c)

$$-784, -392, -196, -98, -49$$

Sol.

S12. Ans.(d)



Sol.

S13. Ans.(e)

$$\times 2 - 1, \times 4 - 3, \times 6 - 5, \times 8 - 7, \times 10 - 9$$

Sol.

S14. Ans.(d)

$$+(6)^3, +(7)^3, +(8)^3, +(9)^3, +(10)^3$$

Sol.

S15. Ans.(c)

$$\times 3 - 3, \times 3 - 3, \times 3 - 3, \times 3 - 3$$

Sol.