

Q:1 Which of the symbols should be placed in the blank spaces in the given expression so as to make $R \leq U$ and $P > S$ definitely true?

$P _ Q _ R _ S _ T _ U _ V$

1. $>, \geq, =, \leq, <$
2. $>, \geq, =, \leq, \leq, <$
3. $>, \geq, >, \leq, \leq, <$
4. $>, \geq, =, \leq, \leq, <$
5. None of these

Q:2 Which of the symbols should be placed in the blank spaces in the given expression so as to make $L \geq O$ and $R > N$ definitely true?

$L _ M _ N _ O _ P _ Q _ R$

1. $\geq, \geq, =, \leq, \leq, <$
2. $>, \geq, >, \leq, \leq, <$
3. $=, \geq, >, \leq, \leq, <$
4. $>, \geq, =, \leq, <, <$
5. None of these

Q:3 Directions: In the given question, two conclusions and three statements are given. You have to decide in which statement/statements, the given conclusions logically follow. Read the statements and conclusions carefully and answer the question.

Conclusions:

- I. $G > I$
- II. $T > X$

Statements:

- I. $S \geq T \geq U = V \geq W > X, F = G \geq H > I$
- II. $S > T \leq U < V > W = X, F > G = H < I$
- III. $S = T > U \leq V \geq W = X, F < G \leq H = I$

1. Both statements I and II follow
2. Both statements II and III follow
3. Only statement I follows
4. Both statements I and III follow
5. Only statement III follows

Q:4 In these questions, relationship between different elements is shown in the statements. These statements are followed by two conclusions. Mark your answer accordingly.

- A. Only conclusion I is true
- B. Only conclusion II is true
- C. Both conclusions I and II are true

D. Either conclusion I or II is true

E. Neither conclusion I nor II is true

Statements: $L = T \geq U = V \leq W > N, N = Y < Z > A < B$

Conclusions:

- I. $W > Z$
- II. $A > U$

1. A
2. B
3. C
4. D
5. E

Q:5 In these questions, relationship between different elements is shown in the statements. These statements are followed by two conclusions. Mark your answer accordingly.

- A. Only conclusion I is true
- B. Only conclusion II is true
- C. Both conclusions I and II are true
- D. Either conclusion I or II is true
- E. Neither conclusion I nor II is true

Statements: $O < P < Z > A < B, S = T \geq U = P \leq W > O$

Conclusions:

- I. $S > A$
- II. $P \geq B$

1. A
2. B
3. C
4. D
5. E

Q:6 In the given statement, the relationship between different elements is shown and it is followed by three conclusions. Choose the correct answer on the basis of the information given below.

Statements: $4 < 5 < 6; 6 \leq 1 > 2; 8 > 9 \geq 4$

Conclusions:

- I. $9 \geq 6$
- II. $9 < 6$
- III. $4 < 1$
1. Only Conclusion I follows
2. All Conclusions follow
3. Either Conclusion I or II and Conclusion III follow
4. Either Conclusion I or II follows
5. Both Conclusions I and II follow



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Logical Reasoning - Inequality

English

Q:7 In the given statement, the relationship between different elements is shown and it is followed by three conclusions. Choose the correct answer on the basis of the information given below.

Statements: $11 > 10 = 9$; $11 < 12 \leq 13$; $12 > 14 = 15$

Conclusions:

I. $13 \geq 15$

II. $14 > 10$

III. $12 > 9$

1. Only Conclusion I follows

2. Only Conclusion III follows

3. Only Conclusion II follows

4. All follow

5. None follows

Q:8 In the given statement, the relationship between different elements is shown and it is followed by three conclusions. Choose the correct answer on the basis of the information given below.

Statements: $15 < 14 = 13$; $15 > 16 \geq 17$; $16 \leq 19 = 20$

Conclusions:

I. $19 \geq 17$

II. $14 > 17$

III. $15 < 20$

1. Both Conclusions I and II follow

2. Both Conclusions II and III follow

3. Both Conclusions I and III follow

4. All follow

5. None follows

Q:9 In the given statement, the relationship between different elements is shown and it is followed by two conclusions. Choose the correct answer on the basis of the information given below.

Statement: In a weighing machine, on the left plate 1 Kg and 5 Kg iron bars were present and on the right plate 2 Kg, 0.5 Kg, and some x Kg rice were present.

Right side plate - Left side plate = 0.3 Kg

Conclusions:

I. $4 \text{ Kg} > x > 3 \text{ Kg}$

II. $x > 3.5 \text{ Kg}$

1. Only I is true

2. Only II is true

3. Both I and II are true

4. Either I or II is true

5. Neither I nor II is true

Q:10 In the given statement, the relationship between different elements is shown and it is followed by three conclusions. Choose the correct answer on the basis of the information given below.

Statements:

$K = L > G \leq Y < U$, $Y > W \geq R = D < K$, $K = H > E < Q$

Conclusions:

I. $K \leq R$

II. $R > E$

III. $Q > K$

1. Only conclusion II follows

2. Only conclusion III follows

3. None follows

4. All conclusions I, II and III follow

5. Both conclusion I and III follow

Answer Key

1. (2)	2. (1)	3. (3)	4. (5)	5. (5)
6. (3)	7. (2)	8. (1)	9. (3)	10. (3)

Answers and Solutions

Q:1 The correct answer is **Option 2** i.e. $>, \geq, =, \leq, <$

From Option I:

$$P > Q \geq R = S \leq T < U < V$$

$$\Rightarrow P > Q \geq R = S \rightarrow P > S \text{ True}$$

$$\Rightarrow R = S \leq T < U \rightarrow R < U \text{ False}$$

From Option II:

$$P > Q \geq R = S \leq T \leq U < V$$

$$\Rightarrow P > Q \geq R = S \rightarrow P > S \text{ True}$$

$$\Rightarrow R = S \leq T \leq U \rightarrow R \leq U \text{ True}$$

As we get our answer so there is no need to solve further options.

Clearly, **Option 2** follows both conditions.

Hence, the correct answer is $>, \geq, =, \leq, <$.

Q:2 The correct answer is **Option 1** i.e. $\geq, \geq, =, \leq, <$

From Option I:

$$L \geq M \geq N = O \leq P \leq Q < R$$

$$\Rightarrow L \geq M \geq N = O \rightarrow L \geq O \text{ True}$$

$$\Rightarrow N = O \leq P \leq Q < R \rightarrow N < R \text{ or } R > N \text{ True}$$

As we get our answer so there is no need to solve further options.

Clearly, **Option 1** follows both conditions.

Hence, the correct answer is $\geq, \geq, =, \leq, <$.

Q:3 The correct answer is **Option 3** i.e. **Only statement I follows**

From Statement I:

$$S \geq T \geq U = V \geq W > X, F = G \geq H > I$$

$$\Rightarrow G \geq H > I \rightarrow G > I \text{ Follows}$$

$$\Rightarrow T \geq U = V \geq W > X \rightarrow T > X \text{ Follows}$$

From Statement II:

$$S > T \leq U < V > W = X, F > G = H < I$$

$$\Rightarrow G = H < I \rightarrow G < I \text{ Doesn't Follows}$$

$$\Rightarrow T \leq U < V > W = X \text{ i.e. opposite signs between T and X} \rightarrow T > X \text{ Doesn't follow}$$

From Statement III:

$$S = T > U \leq V \geq W = X, F < G \leq H = I$$

$$\Rightarrow G \leq H = I \rightarrow G \leq I \text{ Doesn't Follows}$$

$$\Rightarrow T > U \leq V \geq W = X \text{ i.e. opposite signs between}$$

T and X $\rightarrow T > X$ **Doesn't follow**

Clearly, Only Statement I follows the conclusions.

Hence, the correct answer is **Only statement I follows**.

Q:4 The correct answer is **Option 5** i.e. **E**

I. $W > Z =$ (**False**) ($W > N = Y < Z$) opposite symbols is between the elements.

II. $A > U =$ (**False**) ($U = V \leq W > N = Y < Z > A$) opposite symbols is between the elements.

Hence, the correct answer is **E**.

Q:5 The correct answer is **Option 5** i.e. **E**

I. $S > P =$ (**False**) ($S = T \geq U = P \leq W > O < Y < Z > A$)

II. $P \geq B =$ (**False**) ($P \leq W > O < Y < Z > A < B$) opposite symbols is between the elements.

Hence the correct answer is **E**.

Q:6 The correct answer is **Option 3** i.e. **Either Conclusion I or II and Conclusion III follow**

Statements: $4 < 5 < 6; 6 \leq 1 > 2; 8 > 9 \geq 4$

$$\Rightarrow 8 > 9 \geq 4 < 5 < 6 \leq 1 > 2$$

Conclusions:

I. $9 \geq 6 \rightarrow$ **False** ($9 \geq 4 < 5 < 6$ i.e. Opposite sign between the elements)

II. $9 < 6 \rightarrow$ **False** ($9 \geq 4 < 5 < 6$ i.e. Opposite sign between the elements)

III. $4 < 1 \rightarrow$ **True** ($4 < 5 < 6 \leq 1$ i.e. $4 < 1$)

Conclusion I and II make complementary pairs.

Hence, the correct answer is **Either Conclusion I or II follows and Conclusion III follows**.

Q:7 The correct answer is **Option 2** i.e. **Only Conclusion III follows**

Statements: $11 > 10 = 9; 11 < 12 \leq 13; 12 > 14 = 15$

$$\Rightarrow 13 \geq 12 > 11 > 10 = 9; 12 > 14 = 15$$

Conclusions:

I. $13 \geq 15 \rightarrow$ **False** ($13 \geq 12 > 14 = 15$ i.e. $13 > 15$)

II. $14 > 10 \rightarrow$ **False** ($14 < 12 > 11 > 10$ i.e. Opposite sign between the elements)

III. $12 > 9 \rightarrow$ **True** ($12 > 11 > 10 = 9$ i.e. $12 > 9$)

Hence, the correct answer is **Only Conclusion III follows**.

Q:8 The correct answer is **Option 1** i.e. **Both Conclusions I and II follow**



Date : 7th Jan 2024

Logical Reasoning - Inequality

English

Statements: $15 < 14 = 13$; $15 > 16 \geq 17$; $16 \leq 19 = 20$

$\Rightarrow 13 = 14 > 15 > 16 \geq 17$; $16 \leq 19 = 20$

Conclusions:

I. $19 \geq 17 \rightarrow$ **True** ($19 \geq 16 \geq 17$ i.e. $19 \geq 17$)

II. $14 > 17 \rightarrow$ **True** ($14 > 15 > 16 \geq 17$ i.e. $14 > 17$)

III. $15 < 20 \rightarrow$ **False** ($15 > 16 \leq 19 = 20$ i.e. Opposite sign between the elements)

Hence, the correct answer is **Both Conclusions I and II follow**.

Q:9 The correct answer is **Option 3** i.e. **Both I and II are true**

Statement: Right plate - Left plate = 0.3 Kg

$(2 + 0.5 + x) - (1 + 5) = 0.3$

$x = 3.8$

Conclusions:

I. $4 \text{ Kg} > x > 3 \text{ Kg}$: **True** (as $x = 3.8$ which is greater than 3 and less than 4)

II. $x > 3.5 \text{ Kg}$: **True** (as $x = 3.8 \text{ Kg}$)

Hence, the correct answer is **Only II is true**.

Q:10 The correct answer is **Option 3** i.e. **None follows**

The given statements can be concluded as:

$K = L > G \leq Y > W \geq R = D < K = H > E < Q$

I. $K \leq R \rightarrow$ **False** ($K = L > G \leq Y > W \geq R$, signs between the elements are opposite)

II. $R > E \rightarrow$ **False** ($R = D < K = H > E$, signs between the elements are opposite)

III. $Q > K \rightarrow$ **False** ($K = H > E < Q$, signs between the elements are opposite)

Hence, the correct answer is **None follows**.