## Adda247

## IBPS RRB Clerk Mains Previous Year Paper 2022

Directions (1-4): Study the following information carefully and answer the questions given below. A certain number of persons sit in a linear row such that all of them face north direction. Four persons sit between $P$ and $Y$ who sits two persons away from $K$. T sits third to the right of $K$. The number of persons sits between Y and T is same as the number of persons sits between T and W . R sits between P and Y . The number of persons sits between $R$ and $K$ is an odd number but not multiple of 5 . $Q$ sits fourth to the right of W . Even number of persons sits between T and X who sits to the left of $\mathrm{W} . \mathrm{Q}$ is the only immediate neighbor of J. More than one person sits between R and U who sits adjacent to P . The number of persons sits to the right of $J$ is one less than the number of persons sits to the left of $U$.

Q1. How many persons sit in the row?
(a) 27
(b) 29
(c) 23
(d) 30
(e) 33

Q2. Which among the following statement(s) is/are true?
I. Only one person sits to the left of $U$
II. More than ten persons sit to the right of T
III. X sits to the right of W
(a) Only III
(b) Both I and II
(c) Both II and III
(d) Only I
(e)All I, II and III


Q3. If $B$ sits exactly between $Y$ and $X$ then how many persons sit to the left of $B$ ?
(a) 11
(b) 13
(c) 12
(d) 18
(e) 15

Q4. Four of the following five are alike in a certain way and hence form a group. Find the one that doesn't belong to that group?
(a) U
(b) Y
(c) T
(d) W
(e) J

Directions (5-7): Study the following statements and then decide which of the given conclusions logically follows from the given statements disregarding the commonly known facts.

## Q5. Statements:

Only a few high is lower
Some lower is rate
All rate are map
Conclusions:
(a) All high can be lower
(b) Some lower is not high
(c) No rate is high
(d) All rate being lower is a possibility
(e) None follows

## Q6. Statements:

Some plants are not grass
Some trees are plants
Only trees are forest
Conclusions:
(a) All grass can be forest
(b) Some plants can never be forest
(c) All grass is tree
(d) Some trees being grass is not a possibility
(e) None follows

Q7. Statements:
Only a few cutters are sharp
All perfect are shaped
No sharp is perfect

## Conclusions:

(a) All cutter can never be perfect
(b) Some shaped are definitely not sharp
(c) Some sharp being shaped is a possibility
(d) All cutter can be shaped
(e) All follow

Directions (8-11): Study the following information carefully and answer the questions given below.
Eleven boxes - L, M, N, O, P, Q, R, S, T, U and V are kept one above another in a single stack but not necessarily in the same order.
Only one box is kept between box $L$ and box Q . Box V is kept three boxes above box L . The number of boxes kept above box $V$ is the same as the number of boxes kept below box $U$. Not more than one box is kept above box $V$. Box $Q$ is not kept seven boxes above box $U$. Only three boxes are kept between box $L$
and box R which is not kept immediately above box V . The number of boxes kept between box S and box $U$ is a perfect cube of an even number. More than two boxes are kept between box $S$ and box Q . No box is kept between box T and box P. Only three boxes are kept between box N and box P . The number of boxes kept between box $M$ and box $N$ is same as the number of boxes kept between box $L$ and box Q . Box M is kept above box 0 whereas not less than two boxes are kept below box 0 .

Q8. Which of the following statements is/are true with respect to the final arrangement?
(a) Box $S$ is kept at the top-most position
(b) Both box 0 and box R are not kept adjacent to each other
(c) Box L is kept below box N
(d) Box P is kept adjacent to box R
(e) None of these

Q9. Which of the following box is kept third from the top?
(a) Box N
(b) Box L
(c) Box V
(d) Box S
(e) None of these

Q10.If all the boxes are arranged in the alphabetical order from top to bottom, then how many boxes will remain unchanged in its position?
(a) One
(b) Two
(c) Three
(d) Four
(e) None of these

Q11. Which of the following box is kept three boxes above box $T$ ?
(a) The box which is kept two boxes above box Q
(b) The box which is kept immediately below box $U$
(c) The box which is kept two boxes below box L
(d) The box which is kept three boxes below box R
(e) None of these

Q12. In the word "CONTEMPORARY", if the letters are arranged in reverse alphabetical order from the left end, then which of the following consonant will be the third to the left of the vowel which is second from the right end?
(a) R
(b) M
(c) N
(d) $P$
(e) T

Directions (13-16): Study the following information carefully and answer the questions given below.
Ten persons viz. $\mathrm{Q}, \mathrm{R}, \mathrm{S}, \mathrm{T}, \mathrm{U}, \mathrm{V}, \mathrm{W}, \mathrm{X}, \mathrm{Y}$ and Z are sit in a straight line such that some of them are facing north while some are facing south. Not more than two adjacent persons face the same direction. The consecutive alphabetically named person doesn't sit adjacent to each other.
W sits fourth from one of the extreme ends. Y sits second to the right of W where both faces opposite directions. Only three persons sit between Y and Z where at least one person sits on both sides of Z . The number of persons sit to the right of $Z$ is one less than the number of persons sit to the left of $U$ where both face the same direction. $Z$ doesn't sit adjacent to $U$. Only one person sits between $V$ and $X$ who faces south and opposite direction to V . Only two persons sit between R and S . More than two persons sit between R and Q who faces north. The immediate neighbours of X faces the same direction i.e., if one person faces south, then the other faces south and vice versa. At least two persons sit between T and S where both T and R face the same direction.

Q13. The number of persons sit to the right of $R$ is one more than the number of persons sit to the
$\qquad$ .
(a) Left of Z
(b) Right of $V$
(c) Left of Q
(d) Right of T
(e) None of these

Q14. How many persons sit between $W$ and $R$ ?
(a) One
(b) Two
(c) Three
(d) More than three
(e) None



Q15. Who among the following person sits second to the left of $\mathbf{T}$ ?
(a) S
(b) The one who sits fourth to the right of X
(c) Z
(d) The one who sits at one of the ends
(e) None of these

## Q16. What is the position of $\mathbf{Q}$ with respect to $Y$ ?

(a) Fifth to the right
(b) Fourth to the left
(c) Fifth to the left
(d) Fourth to the right
(e) None of these

Directions (17-19): Study the following information carefully and answer the questions given below.

Q17. Which of the following symbols should replaces the blanks (I and II) respectively so that " $\mathrm{J}<\mathrm{F}$ " is definitely true?
$\mathrm{X}>\mathrm{R}=\mathrm{S} \geq \mathrm{J}<\mathrm{K} \leq \mathrm{M}$ _ (I) _ $\mathrm{T}<\mathrm{W}$ _ (II) _Z $=\mathrm{F} \geq \mathrm{B}$
(a) $>,<$
(b) $\leq$, $=$
(c) $\leq, \geq$
(d) $=, \geq$
(e) None of these

Q18. Which of the following symbols should replaces the blanks (I and II) respectively so that " $\mathrm{U} \geq \mathrm{F}$ " is definitely false?
D $<\mathrm{V} \leq \mathrm{K}>\mathrm{U}$ _(I)_R $\leq \mathrm{S}<\mathrm{W} \leq \mathrm{M}=\mathrm{B}$ _(II)_F $\geq \mathrm{P}$
(a) $\geq,>$
(b) $>,=$
(c) $\leq, \geq$
(d) $<, \leq$
(e) None of these

Q19. Which of the following order of letters in the blanks makes the expression $L>M$ is definitely true?
$\__{-}<{ }_{-} \geq_{-}>\geq_{-} \leq-$
(a) U, B, L, H, K, C, M
(b) M, U, H, L, B, K, C

(c) U, L, B, H, K, M, C
(d) L, U, B, H, M, K, C
(e) None of these

Directions (20-23): Study the following information carefully and answer the below questions.
Six persons- $0, P, Q, R, S$ and $T$ bought the shirts on different days of the same week starting from Monday to Saturday. They bought different color shirts- Violet, Purple, Brown, Grey, Pink, and Black. All the information is not necessarily in the same order.
T bought the shirt three days before the one who bought the Grey color shirt. As many persons bought before T as after Q . Only one day is there between the one who bought Pink color shirt and Q. The one who bought the Purple color shirt bought immediately before the one who bought the Brown color shirt. Q does not buy the Brown color shirt. O bought immediately before the one who bought the Black color shirt. Neither R nor $S$ bought the violet color shirt. R bought before $S$ but not before $P$.

Q20. How many persons bought the shirts between $P$ and the one who bought the Purple color shirts?
(a) As many persons bought the shirts between 0 and $S$
(b) Two
(c) One
(d) As many persons bought the shirts before R
(e) None

Q21.Who among the following person bought Brown color shirts?
(a) The one who bought immediately before $S$
(b) The one who bought immediately after P
(c) T
(d) $Q$
(e) P

Q22.Which of the following combination is true?
(a) Q-Black
(b) S-Brown
(c) O-Pink
(d) R-Purple
(e) P-Grey

Q23. Which of the following color shirt does $\mathbf{T}$ buy?
(a) Brown
(b) Purple
(c) Black

(d) Grey
(e) Pink

Q24. If the fourth letter from the right end of each word is taken then which of the following combination formed a meaningful word?
I. Sacks, Budget, Corner, Sweet
II. Papaya, Brown, Number, Multiple
III. Black, Mother, Queen, Course
(a) Both II and III
(b) Only III
(c) Only I
(d) Only II
(e) All I, II and III

## Directions (25-28): Study the following information carefully and answer the questions given

 below.Eight persons- A, B, C, D, E, F, G and H are working in a company at different designations such as Chief Financial officer (CFO), Executive Director (ED), General Manager (GM), Deputy General Manager (DGM), Manager, Assistant Manager (AM), PO and Clerk whereas the chief financial officer (CFO) is the senior most designation and the clerk is the junior most designation. Each of them belongs to different citiesAgra, Indore, Udaipur, Jaipur, Pune, Haridwar, Meerut and Mathura. All the information is not necessarily in the same order.
The one who belongs to Pune is three designations senior to D. Not more than three persons are senior to the one who belongs to Pune. B is just senior to the one who belongs to Pune. F is designated as just junior to $D$. Two persons are designated between $F$ and the one who belongs to Meerut. The number of persons designated between D and F is two less than the number of persons designated between E and D . The one who belongs to Mathura is two designations senior to E. H is just junior to C. Three persons are designated between C and the one who belongs to Agra. G is junior to the one who belongs to Agra and senior to the one who belongs to Indore. The number of persons designated as senior to the one who belongs to Indore is same as the number of persons designated as junior to the one who belongs to Udaipur. The one who belongs to Jaipur is designated as just junior to the one who belongs to Indore.

Q25. Who among the following belongs to Haridwar?
(a) The one who is designated as PO
(b) G
(c) D
(d) The one who is designated as clerk
(e) E

Q26. Who among the following is designated as Manager?
(a) E
(b) The one who belongs to Meerut
(c) A
(d) The one who is two persons junior to A
(e) G


Q27. How many persons are designated between the one who belongs to Agra and the one who is designated as just senior to D ?
(a) Five
(b) Three
(c) Four
(d) Six
(e) Two

Q28. Which among the following statement(s) is/are true?
(a) A is designated at the senior most designation
(b) More than four persons are designated as senior to H
(c) The one who belongs to Jaipur is designated as PO
(d) The one who belongs to Mathura is just junior to the one who is designated as CFO
(e) All are true

Directions (29-32): Study the following information carefully and answer the questions given below.
Aman started walking from point J towards the north. After walking for 10 km he reached point K and then he takes a left turn and walks for 18 m to reach point L . From L he takes a right turn and walks for 20 m to reach point M . From M he takes two consecutive left turn and walks for 30 m and 12 m to reach points N and O respectively.
Bablu started walking from point $T$ towards the east for 12 m to reach point P . Then he takes a right turn and walks for 25 m to reach point Q . Then he turns east and walks for 16 m to reach point R . Then he takes a right turn and walks for 27 m to reach point S . Then he takes a right turn and walks for 20 m to reach point 0 .

Q29.What is the direction of $L$ with respect to point $R$ ?
(a) North-east
(b) North-west
(c) South-east
(d) South-west
(e) Can't be determined

Q30.Four of the following five are alike in a certain way based on the directions in the given arrangement and thus form a group. Which one of the following does not belong to the group?
(a) SN
(b) MK
(c) RL
(d) NJ
(e) PK


Q31.What is the shortest distance between point $\mathbf{N}$ and point $\mathbf{S}$ ?
(a) $\sqrt{540} \mathrm{~m}$
(b) $\sqrt{544} \mathrm{~m}$
(c) $\sqrt{504} \mathrm{~m}$
(d) $\sqrt{554} \mathrm{~m}$
(e) $\sqrt{520} \mathrm{~m}$

Q32. What is the total distance between point $R$ and point $L$ ?
(a) 44 m
(b) 45 m
(c) 46 m
(d) 47 m
(e) 48 m

Q33. If in the number " 4785396281 ", positions of the first and the sixth digits are interchanged, positions of the second and seventh digits are interchanged and so on till the positions of fifth and tenth digits are interchanged, then what is the sum of the digits which are $3^{\text {rd }}$ from right end, $2^{\text {nd }}$ from the left end and $4^{\text {th }}$ from the left end?
(a) 27
(b) 22
(c) 30
(d) 32
(e) 34

Directions (34-37): Study the following information carefully and answer the questions given below.
Eleven persons sit around a circular table such that all of them face towards the centre of the table. Only two persons sits between $P$ and $U$ (either from left or right). $W$ sits three persons away from $U$. $Q$ sits adjacent to $U$. $S$ sits third to the left of $Q$. The number of persons sit between $S$ and $W$ is multiple of 4 when counts from the right of S . Z sits adjacent to P and three persons away from Y. W doesn't sit adjacent to $Y$. X sits third to the left of V. R sits second to the left of T.

Q34. How many persons sit between $R$ and $Y$ when counted from the left of $Y$ ?
(a) Four
(b) Three
(c) Five
(d) Six
(e) Two

Q35. Which among the following statement(s) is/are not true?
(a) R sits third to the right of $Q$
(b) No one sits between T and Z when counts from the left of Z
(c) Even number of persons sits between $T$ and $U$ when counts from the left of $U$
(d) V sits adjacent to the one who sits second to the left of S
(e) All are true

Q36. If $Q$ is related to $S$, in the similar way $W$ is related to $U$ then who among the following is related to V ?
(a) $P$
(b) T
(c) X
(d) Z
(e) None of these

Q37. Four of the following five are alike in a certain way and hence form a group. Find the one that doesn't belong to that group?
(a) WX
(b) SP
(c) TV
(d) UY
(e) PW

Directions (38-40): Study the following information carefully and answer the questions given below.
A family of three generation consist of eight members and two married couples. R is the brother-in-law of $G$ and vice-versa. Both S and Rare siblings. S has only one sister. H is the child of T and parent of E . U is the father-in-law of G. Both $S$ and $U$ are of the same gender. $U$ is the spouse of $T .0$ is the paternal grandmother of H's child. E is of the same gender as U .

Q38.How many female members are there in the family?
(a) 6
(b) 3
(c) 4
(d) 5
(e) Can't be determined

Q39.How is E related to $R$ ?
(a) Sister
(b) Brother
(c) Nephew
(d) Niece
(e) Can't be determined

Q40.Who among the following person is the uncle of U's grandchild?
(a) R
(b) S
(c) H
(d) Both R and S
(e) Both S and H

Q41. $P$ scored $20 \%$ more marks than $Q$ in an exam. If both scored four marks more, then the sum of marks scored by $P$ and $Q$ together would have been $20 \%$ more than the passing marks of the exam. If passing marks of the exam is 80 , then find the marks scored by $P$ ?
(a) 52
(b) 48
(c) 46
(d) 54
(e) 50

Q42. Out of the total population in a city, $25 \%$ casted invalid votes and the winning candidate received $14 \frac{2}{7} \%$ more than votes received by the loosing candidate. Find the percentage of votes received by winning candidate with respect to the total votes in the city (only two candidates participated in the elections)
(a) $40 \%$
(b) $25 \%$
(c) $50 \%$
(d) $75 \%$
(e) $60 \%$

Q43. $P$ alone can do a work in 30 days. The time taken by $P$ alone to complete the work is $\mathbf{5 0 \%}$ more than the time taken by $Q$ alone to complete the work. If $P$ and $Q$ work alternatively starting with $Q$, then in how many days the whole work will be completed.
(a) 36
(b) 18
(c) 12
(d) 24
(e) 30

Q44. The ratio of income of $P$ to that of $Q$ is $2: 3$ and the ratio of expenditure of $P$ to that $Q$ is 5:6. If the income of $Q$ is increased by $50 \%$ and expenditure is same, then the saving of $Q$ becomes Rs.12000. If saving of $P$ is Rs.3000, then find the income of $P$.
(a) Rs. 10500
(b) Rs. 9500
(c) Rs. 7000
(d) Rs. 5000
(e) Rs. 8000


Q45. In 120 liters mixture of milk and water, quantity of milk is $58 \frac{1}{3} \%$ If ( $\mathrm{X}+15$ ) liters of the mixture is taken out and 8 litres milk added in the remaining mixture, then the difference between quantity of milk and water in final mixture becomes 20 liters. Find the value of $X$.
(a) 19
(b) 45
(c) 22
(d) 33
(e) 29

Directions (46-50): The pie chart given below shows the percentage distribution of total number of employees joined in four (A, B, C \& D) different companies in March. The table given below shows the number of employees till February in each of the company and the number of employees left in November in each company.

Note: (i) No employees left or join in any company in any month other than the given data.
(ii) Number of employees remain at the end of November in company D is 900.

## Employees joined in March

24\%
20\%
$\square$
$\square$
$\square$

26\%

$\square$
$=D$

| Companies | Number of <br> employees till <br> February | Number of <br> employees left in <br> November |
| :--- | :---: | :---: |
| A | 200 | 100 |
| B | 350 | 150 |
| C | 300 | 180 |
| D | 400 | 220 |

Q46. Find the ratio of the total number of employees joined company $D$ in March to the total number of employees in company $C$ in December.
(a) $5: 7$
(b) $4: 3$
(c) $4: 5$
(d) $5: 8$
(e) $8: 5$

Q47. Find the number of employees remain in Company $A$ at the end of November is how much more or less than the number of employees in company $B$ at the end of December.
(a) 400
(b) 450
(c) 200
(d) 500
(e) 350

Q48. Out of the total employees joined in March in company $C$, the number of male employees are $\mathbf{6 0 \%}$ more than females. Find the number of female employees joined in March in company $C$ is what percentage of the number of employees remain in company $D$ in November.
(a) $12.5 \%$
(b) $32.5 \%$
(c) $66.66 \%$
(d) $37.5 \%$
(e) $33.33 \%$

Q49. In December, 300 employee joined company $D$. Find the number of employees in company $A$ in November is what percentage less than that of number of employees in company $D$ in December.
(a) $45 \%$
(b) $32.5 \%$
(c) $66.66 \%$
(d) $41.66 \%$
(e) $33.33 \%$

Q50. Find the average number of employees in all four companies at the end of November.
(a) 840
(b) 900
(c) 720
(d) 950
(e) 1050

Q51. Train A running at speed of ' $s$ ' m/s can overtakes train $B$ which running at speed of $54 \mathrm{~km} / \mathrm{hr}$ in 16 seconds. The ratio of length of train $A$ to that of train $B$ is 21:19. If Train $A$ crosses $\mathbf{3 0}$ meters long platform in 6 seconds, then find the value of ' $s$ '.
(a) 40
(b) 45
(c) 20
(d) 30
(e) 35

Q52. A started a business by investing of Rs.6000. After $X$ months, $B$ joined the business with investment of Rs.7000. At the end of a year, the ratio of profit share of $A$ to that of $B$ was 12:7. Find the value of $X$.
(a) 4
(b) 5
(c) 2
(d) 6
(e) 3

Q53. Two years ago, the ratio of age of $A$ to that of $B$ was 2:3. After six years, the ratio of age of $A$ to that of $B$ will be 6:7. If present age of $C$ is six years more than that of $B$, then find the present age of $C$ (in year).
(a) 24
(b) 15
(c) 12
(d) 16
(e) 14

Q54. $X$ is $75 \%$ more than $Y$ and $Z$ is 60 less than $X$. If the average of $X, Y$ and $Z$ is 340 and the ratio of $Y$ to $Z$ is 2 : $a$, then find the value of ' $a$ '.
(a) 9
(b) 7
(c) 3
(d) 5
(e) 1

Q55. The marked price of a pen is Rs. 100 and the marked price of a copy is Rs.120. The ratio of selling price of the pen to that of the copy is $5: 2$. If the discount given on copy is two times of the discount given on the pen, then find the selling price of the copy.
(a) 40
(b) 45
(c) 20
(d) 30
(e) 35

Directions (56-60): In the given questions, two quantities are given, one as 'Quantity I' and another as 'Quantity II'. You have to determine relationship between two quantities and choose the appropriate option.

Q56. The distance between point $P$ and $Q$ is 56 km . A boat travels first 40 km distance downstream in 2.5 hours and rest distance upstream in $\mathbf{2}$ hours.
Quantity I: If the speed of stream is increase by $20 \%$, then find the total distance travelled by the boat downstream in 5 hours.
Quantity II: Find the distance travel by the boat upstream in 10.5 hours.
(a) Quantity I > Quantity II
(b) Quantity I < Quantity II
(c) Quantity I $\geq$ Quantity II
(d) Quantity I $\leq$ Quantity II
(e) Quantity I = Quantity II or no relation

Q57. Father distributed some money in between his two (A and B) daughters in the ratio of 5:8 respectively. A invests her share in a scheme which offer simple interest at rate of $6 \%$ p.a. for 7 years and she gets total amount of Rs. 6816 from the scheme.
Quantity I: Find the share B got from her father.
Quantity II: Rs. 5000
(a) Quantity I > Quantity II
(b) Quantity I < Quantity II
(c) Quantity I $\geq$ Quantity II
(d) Quantity I $\leq$ Quantity II
(e) Quantity I = Quantity II or no relation

Q58. Side of a square is $20 \%$ more than the breadth of a rectangle and length of the rectangle is 1 m more than side of the square. The perimeter of the rectangle is $\mathbf{6} \mathbf{m}$ less than the perimeter of the square.
Quantity I: Area of rectangle.
Quantity II: Area of circle which radius is 10 m less than side of the square.
(a) Quantity I > Quantity II
(b) Quantity I < Quantity II
(c) Quantity I $\geq$ Quantity II
(d) Quantity I $\leq$ Quantity II
(e) Quantity I = Quantity II or no relation

Q59. $N$ pipes can fill a tank in ( $\mathrm{N}-2$ ) hours. ( $\mathrm{N}-2$ ) pipes working with three times the efficiency of N pipes, can fill the tank in ( $\mathrm{N}-8$ ) hours.
Quantity I: Value of N.
Quantity II: 10
(a) Quantity I > Quantity II
(b) Quantity I < Quantity II
(c) Quantity I $\geq$ Quantity II
(d) Quantity I $\leq$ Quantity II
(e) Quantity I = Quantity II or no relation

Q60.
For equation $\mathrm{ax}^{2}-\mathrm{bx}+\mathrm{c}=0$, product of roots is $\frac{15}{4}$ and one root of the equation is $\frac{3}{2}$.
Quantity I: value of $(a+b)$
Quantity II: value of $(a+c)$
(a) Quantity I > Quantity II
(b) Quantity I < Quantity II
(c) Quantity I $\geq$ Quantity II
(d) Quantity I $\leq$ Quantity II
(e) Quantity I = Quantity II or no relation

Directions (61-65): Read the following information carefully and answer the questions given below.
There are three types of mixtures in three ( $\mathrm{A}, \mathrm{B}$ and C ) different vessels. The ratio of milk and water in A is $5: 2$ respectively. The ratio of milk and syrup in $B$ is $2: 1$. The quantity of water in $C$ is equal to that of $A$. If 28 liters of the mixture is taken out from $A$ and added into $B$, then the quantity of milk in $B$ becomes 40 liters.
If $40 \%$ of the mixture from $C$ is removed, then the quantity of syrup in $C$ becomes 15 liters. The ratio of initial quantities of mixture in $B$ and $C$ is 6: 13 respectively.

Q61. Find the ratio of initial quantity of mixture in vessel $A$ to the final quantity of water in vessel C after removing $\mathbf{4 0 \%}$ of the mixture.
(a) $35: 6$
(b) $45: 13$
(c) $22: 9$
(d) $1: 39$
(e) 17:9

Q62. Find the sum of the final quantity of mixture in all the three vessels (in litres)?
(a) 209
(b) 245
(c) 229
(d) 139
(e) 179

Q63. The final quantity of water in $A$ is what percentage of the initial quantity of syrup in $B$ ?
(a) $320 \%$
(b) $325 \%$
(c) $350 \%$
(d) $375 \%$
(e) $360 \%$


Q64. What is the ratio between final quantity of water in $C$ to final quantity of syrup in $B$ ?
(a) $35: 6$
(b) $45: 13$
(c) $22: 9$
(d) $12: 5$
(e) $17: 9$

Q65. Find the sum of initial quantity of mixture in $A$ and final quantity of mixture in $C$.
(a) 219
(b) 245
(c) 229
(d) 139
(e) 179

Directions (66-70): What will come in the place of question (?) mark in following number series:
Q66. 18, 62, 93, 113, ?, 128,
(a) 120
(b) 122
(c) 123
(d) 124
(e) 125

Q67. 100, 325, 69, 358, 34, ?
(a) 395
(b) 245
(c) 365
(d) 785
(e) 725

Q68. 10, 21, ?, 153, 450, 1341
(a) 33
(b) 45
(c) 54
(d) 36
(e) 39

Q69. ?, 12, 18, 27, 40.5, 60.75
(a) 8
(b) 9
(c) 4
(d) 3
(e) 2

Q70. 2, 6, 21, 110, ?, 8558
(a) 687
(b) 577
(c) 547
(d)677
(e) 777

Directions (71-75): There are four ( $A, B, C$ and $D$ ) apartments. The table shows the percentage distribution of number of flats ( 1 BHK \& 2 BHK ) in each apartment out of total number of flats in all four apartments and it also shows the percentage by which 2BHK flats are less than the 1 BHK flats in each apartment. Read the data carefully and answer the questions.
Note: Average number of flats in all four apartments are 125.

| Apartments | Percentage of flats out of <br> total number of flats in <br> all the apartments | Percentage of the number of <br> 2BHK flats are less than the <br> number of 1BHK flats |
| :---: | :---: | :---: |
| A | X | $75 \%$ |
| B | 3 X | $50 \%$ |
| C | $3 \mathrm{X}-5$ | $75 \%$ |
| D | $4 \mathrm{X}-5$ | $60 \%$ |

Q71. Find the ratio of total number of 2BHK flats in apartment $C$ and $D$ together to total number of 1BHK flats in apartment $A$.
(a) $15: 7$
(b) $4: 3$
(c) $22: 9$
(d) $15: 8$
(e) $8: 15$

Q72. In apartment $E$, the number of $1 B H K$ flats are $30 \%$ more than that of in apartment $B$ and the number of 2 BHK flats are $\mathbf{2 0 \%}$ less than that of in apartment D . Find the total number of flats in apartment $E$.
(a) 140
(b) 145
(c) 120
(d) 130
(e) 170

Q73. What is the difference between the total number of 1 BHK flats in apartment $B$ and total number of 2BHK flats in apartment $D$ ?
(a) 40
(b) 45
(c) 20
(d) 50
(e) 35

Q74. The total number of 2BHK flats in apartment $C$ is what percent of total flats in apartment $A$ and $B$ together.
(a) $12.5 \%$
(b) $32.5 \%$
(c) $15 \%$
(d) $37.5 \%$
(e) $25 \%$

Q75. $\mathbf{2 0 \%}$ of the 2BHK flats in apartment $C$ are in under-construction and $\mathbf{1 0 \%}$ of the remaining flats are not booked and rest flats are booked. Find the total number of booked flats (All 1BHK flats are booked in apartment C)
(a) 108
(b) 118
(c) 112
(d) 98
(e) 96

Directions (76-80): In each of these questions, two equations (I) and (II) are given. You have to solve both the equations and give answer.

Q76.
(i) $12 x^{2}=11 x-2$
(ii) $(3 y+7)^{2}=1$
(a) if $x>y$
(b) if $x \geq y$
(c) if $x<y$
(d) if $x \leq y$
(e) if $x=y$ or no relation can be established between $x$ and $y$.

Q77.
(i) $3 x^{2}-5 x-2=0$
(ii) $10 y^{2}+7 y=-1$
(a) if $x>y$
(b) if $x \geq y$
(c) if $x<y$
(d) if $x \leq y$
(e) if $x=y$ or no relation can be established between $x$ and $y$.

Q78.
(i) $x^{2}-16 x+48=0$
(ii) $2 y^{2}-13 y+18=0$
(a) if $x>y$
(b) if $x \geq y$

(c) if $x<y$
(d) if $x \leq y$
(e) if $x=y$ or no relation can be established between $x$ and $y$.

Q79.
(i) $\frac{10}{x^{2}}-\frac{13}{x}+4=0$
(ii) $\frac{14}{y^{2}}+2=\frac{11}{y}$
(a) if $x>y$
(b) if $x \geq y$
(c) if $x<y$
(d) if $x \leq y$
(e) if $x=y$ or no relation can be established between $x$ and $y$.


Q80.
(i) $5 x^{2}-4 x-28=0$
(ii) $8 y^{2}-6 y-9=0$
(a) if $x>y$
(b) if $x \geq y$
(c) if $x<y$
(d) if $x \leq y$
(e) if $x=y$ or no relation can be established between $x$ and $y$.

Directions (81-85): Given below are five sentences, with four words highlighted in each sentence. One of these words may be the misspelled form of a word, making the sentence contextually incoherent. Mark the option which depicts the corresponding letter to the incorrectly spelled word, or mark option (e) if there is none.

Q81. The audaciuos (A) mountaineer embarked (B) on a perilous (C) expedition to scale the formidable (D) peak.
(a) A
(b) B
(c) C
(d) D
(e) No spelling errors

Q82. The convoluted (A) legal jagron (B) in the contract (C) was difficult to decipher (D) without legal expertise.
(a) A
(b) B
(c) C
(d) D
(e) No spelling errors

Q83. The ubiquitous (A) use of technology has catalyzed (B) a paradigme (C) shift in the way we communicate (D).
(a) A
(b) B
(c) C
(d) D
(e) No spelling errors

Q84. The garrulous (A) politician delivered a bombastic (B) speech, extolling (C) the virtues of his policies and disparging (D) his opponents with scathing remarks.
(a) A
(b) B
(c) C
(d) D
(e) No spelling errors

Q85. The magnanimous (A) philanthropist donated a prodigous (B) sum of money to fund research into curing (C) rare diseases, demonstrating his altruistic (D) spirit.
(a) A
(b) B
(c) C
(d) D
(e) No spelling errors

## Directions (86-93): Read the passage given below and answer the following questions.

The ongoing conflict between Russia and Ukraine has had far-reaching impacts on both countries, as well as on the global economy. One of the lesser-known consequences of the war is the impact it had on the production and export of mustard oil. Mustard oil is an important agricultural commodity in both Russia and Ukraine, with significant production and export capabilities. However, since the start of the conflict, the trade routes between the two countries have been severely disrupted, making it difficult for farmers and producers to transport their goods across the border. This has resulted in a shortage of mustard oil in some parts of the world, particularly in countries that rely heavily on imports from Russia and Ukraine. The rise in demand for this essential oil has also led to a surge in prices, making it more expensive for consumers to purchase. Furthermore, the war has also had a significant impact on the farmers and producers of mustard oil in both Russia and Ukraine.
The war has also exacerbated existing tensions and divisions within both Russia and Ukraine, as well as among their allies and international partners. The international community has struggled to find a solution to the conflict, with many countries imposing economic sanctions on Russia in response to its actions in Ukraine. Despite numerous attempts at peace negotiations and ceasefires, the conflict has continued to escalate over the years, with both sides blaming the other for the ongoing violence and unrest. The impact of the war has been felt not only in Ukraine and Russia but also in neighboring countries and beyond. As the situation continues to unfold, it is important for the international community to remain engaged and committed to finding a peaceful resolution to the conflict. Only through diplomatic efforts and a commitment to dialogue and compromise can we hope to bring an end to the suffering and instability caused by the Russia-Ukraine war.
The shortage of mustard oil caused by the Russia-Ukraine conflict has had a significant impact on those who rely on this oil for its health benefits. Some have turned to alternative sources of oils with similar properties, such as olive oil. However, the scarcity of mustard oil has also led to an increase in demand for alternative oils, such as rapeseed and sunflower oil. As the conflict continues, it is unclear how long the shortage of mustard oil will persist, and what the long-term impacts will be. However, it is clear that the war has disrupted the production and trade of this important commodity, with far-reaching effects on both the local and global economy, as well as on the health and well-being of those who rely on this oil for its nutritional and therapeutic properties.

## Q86. What is the impact of the Russia-Ukraine conflict on the production and export of mustard oil?

(a) Farmers and producers find it challenging to transport their products across the border.
(b) The conflict has led to an increase in the production and export of mustard oil in both countries.
(c) The substantial disruption of the commercial channels between the two nations has decreased.
(d) The conflict has led to the establishment of new trade routes for the transportation of mustard oil.
(e) Both (a) and (c)

Q87. How has the war between Russia and Ukraine affected international relations?
(a) The conflict has brought about greater cooperation and unity among countries.
(b) The international community has been divided in its response to the conflict.
(c) The war has had no significant impact on agreements of international relations.
(d) The conflict has even led to an increase in global trade and economic activity.
(e) All of these

Q88. How have consumers responded to the shortage of mustard oil caused by the conflict between Russia and Ukraine?
(i) By reducing their consumption of oils
(ii) By increasing their consumption of mustard oil
(iii) By turning to alternative sources of oils
(a) Only (i) and (ii)
(b) Only (iii)
(c) All of these
(d) Only (ii) and (iii)
(e) None of these

Q89. What is/are the impact(s) of the shortage of mustard oil caused by the Russia-Ukraine conflict?
(a) Consumers have had to pay more for mustard oil due to the surge in prices.
(b) The demand for alternative oils, such as rapeseed and sunflower oil, has decreased.
(c) There has been no impact on the global economy due to the shortage of mustard oil.
(d) Only (b) and (c)
(e) All of these

Q90. What is one of the impacts of the Russia-Ukraine conflict on farmers and producers of mustard oil in both countries?
(a) An increase in the quality of mustard oil
(b) A decrease in the demand for mustard oil
(c) A decrease in the price of mustard oil
(d) A decrease in the productivity of mustard oil
(e) An increase in trade between closed countries

Q91. Which of the following idiomatic phrases best conveys the intended meaning of the word "compromise," as highlighted in the given passage?
(a) Go for broke
(b) All or nothing
(c) Stand your ground
(d) Meet halfway
(e) Dig in your heels

Q92. According to the given passage, what is/are the optimum way(s) to bring an end to the Russia-Ukraine conflict?
(a) Diplomatic efforts and a commitment to dialogue and compromise.
(b) Economic sanctions against both Russia and Ukraine.
(c) Military intervention by the international community.
(d) Both (b) and (c)
(e) All of these

Q93. Which one of the following words is opposite in meaning to the word "RELY," as highlighted in the given passage?
(a) conviction
(b) aphorism
(c) precept
(d) wariness
(e) credence

Directions (94-100): In each of the following questions, a sentence has been divided into four parts in which one part has an error. Identify the part that has an error and mark that part as your answer. If all parts are error-free then choose 'No Error' as your correct choice.

Q94. The serene beach, (A)/ with its crystal-clear waters and powdery sand, (B)/ have the perfect spot to (C)/ unwind after a long week of work. (D)
(a) A
(b) B
(c) C
(d) D
(e) No Error

Q95. Despite the fact that (A)/ the weather had not ideal, (B)/ the group decided to proceed (C)/ with the planned hiking trip. (D)
(a) A
(b) B
(c) C
(d) D
(e) No Error

Q96. The book was too difficult (A)/ for me to understand, (B)/ so I decided to (C)/ read a summary online. (D)
(a) A
(b) B
(c) C
(d) D
(e) No Error

Q97. Although I don't (A)/ really like spicy food, (B)/ I decided try the hot wings (C)/ and ended up regretting it later. (D)
(a) A
(b) B
(c) C
(d) D
(e) No Error

Q98. Sarah had always dreamed (A)/ of traveling the world, (B)/ but she never imagined she will end (C)/ up living in a small village in rural Italy. (D)
(a) A
(b) B
(c) C
(d) D
(e) No Error

Q99. Obesity is complex health issue (A)/ that requires individual and (B)/ collective efforts to prevent (C)/ chronic diseases and promote well-being. (D)
(a) A
(b) B
(c) C
(d) D
(e) No Error

Q100. Healthcare inequality affects $(A)$ / vulnerable populations but (B)/demand the equitable distribution (C) of resources and services. (D)
(a) A
(b) B
(c) C
(d) D
(e) No Error

Directions (101-107): In each of the following questions, a sentence has been given with two blanks. For each question, five options are given, each containing two words. You have to choose the most suitable option that fits both the blanks grammatically and contextually.

Q101. $\qquad$ the fact that we come from different backgrounds and have different opinions, we can $\qquad$ work together towards a common goal.
(a) Because of, but
(b) Despite, still
(c) Due to, unless
(d) However, even
(e) Since, anyhow

Q102. $\qquad$ taking a few minutes to plan out my day and set some goals, I was able to stay productive and focused $\qquad$ the day.
(a) For, all over
(b) Into, through
(c) By, throughout
(d) To, all the time
(e) From, besides

Q103. $\qquad$ the right attitude and a little bit of luck, $\qquad$ is possible in life.
(a) Since, something
(b) Though, anything
(c) Even, everything
(d) With, anything
(e) However, nothing

Q104. $\qquad$ the summer, I like to go swimming in the lake and spend time $\qquad$ my family.
(a) Outside of, in
(b) During, with
(c) Before, along
(d) Besides, from
(e) After, through

Q105. $\qquad$ going to the party, I stopped $\qquad$ the store to pick up some snacks and drinks.
(a) While, into
(b) Amidst, for
(c) When, onto
(d) Before, by
(e) Behind, from


Q106. In addition $\qquad$ studying for my exam, I need to work $\qquad$ my research paper.
(a) for, by
(b) to, on
(c) in, in
(d) by, for
(e) of, for

Q107. Without $\qquad$ hesitation, she jumped $\qquad$ the pool and swam to the other side.
(a) none, for
(b) some, by
(c) many, in
(d) any, into
(e) little, to

Directions (108-113): There are six sentences given below in the jumbled form. You have to rearrange the given sentences to make a contextually meaningful paragraph and answer the following questions:
(A) When inflation rises, the purchasing power of consumers decreases, and the cost of living increases.
(B) However, if inflation continues to rise, it can lead to hyperinflation, which can have catastrophic effects on the economy.
(C) This, in turn, leads to reduced spending and lower demand for goods and services.
(D) Inflation is the general increase in prices of goods and services in an economy over time.
(E) Businesses respond to this by reducing production and laying off workers, causing a decrease in economic growth.
(F) It has a significant impact on the overall economic conditions of a country.

Q108. Which of the following would be the THIRD sentence after rearrangement?
(a) A
(b) B
(c) E
(d) F
(e) C

Q109. Which of the following would be the FIRST sentence after rearrangement?
(a) E
(b) C
(c) D
(d) A
(e) B


Q110. Which of the following would be the SECOND sentence after rearrangement?
(a) A
(b) B
(c) E
(d) F
(e) C

Q111. Which of the following would be the FIFTH sentence after rearrangement?
(a) B
(b) A
(c) D
(d) C
(e) E

Q112. Which of the following would be the LAST sentence after rearrangement?
(a) F
(b) B
(c) E
(d) D
(e) C

Q113. Which of the following would be the correct rearrangement of the given sentences?
(a) DFACEB
(b) CBEADF
(c) ACEBDF
(d) DEBFCA
(e) FAEDCB

Directions (114-120): In each of the following questions, a sentence is given with a highlighted phrasal verb. For each question, five sentences are given as options, conveying the intended meaning of the sentence given in the question. Choose the sentence that conveys the intended meaning in the most appropriate way.

Q114. He's got a chip on his shoulder because he didn't get the promotion.
(a) He is carrying a potato chip on his shoulder for no apparent reason.
(b) He is feeling resentful because he believes he deserved the promotion.
(c) He has a literal chip on his shoulder, causing him physical discomfort.
(d) He is angry at his colleague and manager who did get the promotion.
(e) He has a microchip embedded in his shoulder that is causing him problems.

Q115. She's always looking for a silver lining, even in the toughest of situations.
(a) She is obsessed with the color silver and is always looking for things of that color.
(b) She wears silver lining clothes that make her stand out.
(c) She only looks for the positive aspects in easy situations.
(d) She is always searching for a piece of silver lining in a dark room.
(e) She tries to find something positive even in the most challenging situations.

Q116. She was walking on thin ice when she started criticizing her boss.
(a) She was literally walking on a thin layer of ice while criticizing her boss.
(b) She was taking a significant risk by criticizing her boss.
(c) She was not in danger while criticizing her boss.
(d) She was in a place with very thin air and she started to criticize her boss.
(e) She was ice skating while criticizing her boss.

Q117. I'm really swamped with work this week, but I'm hoping to catch up over the weekend.
(a) I'm extremely burdened with a workload this week, but I'm hopeful that I'll balance it out over the next week.
(b) I'm extremely busy with work this week, but I'm hopeful that I'll be able to catch up over the weekend.
(c) I'm genuinely inundated with work this week, but I'm expecting to match up over the coming weekends.
(d) I'm not very bogged down with assignments, but I'm looking forward to catching up on them over the weekend.
(e) I'm considerably overwhelmed with tasks this week, but I'm anticipating recovering over the weekend.

Q118. She was as cool as a cucumber when faced with a difficult task.
(a) She was feeling cold and shivering, like a cucumber, when faced with a difficult task.
(b) She was literally as cool as a cucumber, with a low body temperature, when faced with a difficult task.
(c) She remained calm, composed and unflappable when faced with a difficult task.
(d) She was trying to impress others with her cool demeanor when faced with a difficult task.
(e) She was pretending to be calm and cool but was actually nervous when faced with a difficult task.

Q119. I'm going to bite the bullet and ask my boss for a raise.
(a) I'm going to fire on my boss with the bullet and ask for a raise.
(b) I'm going to chomp on the projectile and ask my boss for a raise.
(c) I'm going to face a difficult situation and ask my boss for a raise.
(d) I'm going to eat the lead and ask my boss for a raise.
(e) I'm going to chew on the cartridge and ask my boss for a raise.

Q120. It's important to stay on top of things, otherwise, you might be caught off guard.
(a) It's important to stay informed, otherwise, you might not be prepared for unexpected situations.
(b) It's important to be at the zenith of things, otherwise, you might be caught unawares.
(c) It's important to remain on the summit of things, otherwise, you might be surprised.
(d) It's important to stay at the crest of things, otherwise, you might be taken aback.
(e) It's important to be at the pinnacle of things, otherwise, you might be startled.

## Solutions

## S1. Ans.(c)

Sol.


23 persons sit in the row.

S2. Ans.(d)
Sol.


Only I statement is true.
S3. Ans.(a)
Sol.


If $B$ sits exactly between $Y$ and $X$ then 11 persons sit to the left of $B$.
S4. Ans.(e)
Sol.


Except J , all sit at the middle of the row.

S5. Ans.(d)
Sol.


S7. Ans.(e)
Sol.


S8. Ans.(d)
Sol. Final arrangement:

| Boxes |
| :--- |
| V |
| S |
| M |
| L |
| N |
| Q |
| 0 |
| $R$ |
| P |
| T |
| U |

## S9. Ans.(e)

Sol. Final arrangement:

| Boxes |
| :--- |
| V |
| S |
| M |
| L |
| $N$ |
| Q |
| O |
| $R$ |
| $P$ |
| $T$ |
| $U$ |



S10. Ans.(a)
Sol. Final arrangement:

| Boxes |
| :--- |
| V |
| S |
| M |
| L |
| N |
| Q |
| O |
| R |
| P |
| T |
| U |

S11. Ans.(e)
Sol. Final arrangement:

| Boxes |
| :--- |
| V |
| S |
| M |
| L |
| N |
| Q |
| O |
| R |
| P |
| $T$ |
| U |

## S12. Ans.(d)

Sol. Given word- CONTEMPORARY
After arrangement- YTRRPOONMECA
S13. Ans.(b)
Sol. Final arrangement:


## S14. Ans.(e)

Sol. Final arrangement:


S15. Ans.(b)
Sol. Final arrangement:


## S16. Ans.(a)

Sol. Final arrangement:


S17. Ans.(b)
Sol.
$\mathrm{X}>\mathrm{R}=\mathrm{S} \geq \mathrm{J}<\mathrm{K} \leq \mathrm{M} \leq \mathrm{T}<\mathrm{W}=\mathrm{Z}=\mathrm{F} \geq \mathrm{B}$

## S18. Ans.(d)

Sol.
D $<\mathrm{V} \leq \mathrm{K}>\mathrm{U}<\mathrm{R} \leq \mathrm{S}<\mathrm{W} \leq \mathrm{M}=\mathrm{B} \leq \mathrm{F} \geq \mathrm{P}$

S19. Ans.(c)
Sol.
$\mathrm{U}<\mathrm{L}=\mathrm{B} \geq \mathrm{H}>\mathrm{K} \geq \mathrm{M} \leq \mathrm{C}$

## S20. Ans.(b)

Sol. Final arrangement:

| Days | Persons | Colors |
| :--- | :--- | :--- |
| Monday | P | Violet |
| Tuesday | O | Pink |
| Wednesday | T | Black |
| Thursday | Q | Purple |
| Friday | R | Brown |
| Saturday | S | Grey |

## S21. Ans.(a)

Sol. Final arrangement:

| Days | Persons | Colors |
| :--- | :--- | :--- |
| Monday | P | Violet |
| Tuesday | 0 | Pink |
| Wednesday | T | Black |
| Thursday | Q | Purple |
| Friday | R | Brown |
| Saturday | S | Grey |

## S22. Ans.(c)

Sol. Final arrangement:

| Days | Persons | Colors |
| :--- | :--- | :--- |
| Monday | P | Violet |
| Tuesday | O | Pink |
| Wednesday | T | Black |
| Thursday | Q | Purple |
| Friday | R | Brown |
| Saturday | S | Grey |

## S23. Ans.(c)

Sol. Final arrangement:

| Days | Persons | Colors |
| :--- | :--- | :--- |
| Monday | P | Violet |
| Tuesday | O | Pink |
| Wednesday | T | Black |
| Thursday | Q | Purple |
| Friday | R | Brown |
| Saturday | S | Grey |

## S24. Ans.(c)

Sol. I. Sacks, Budget, Corner, Sweet - A, D, R and W - DRAW
II. Papaya, Brown, Number, Multiple - P, A, M and I - No meaningful word
III. Black, Mother, Queen, Course - L, T, U and U - No meaningful word

## S25. Ans.(d)

Sol.

| Designation | Persons | Cities |
| :---: | :---: | :---: |
| CFO | A | Agra |
| ED | G | Mathura |
| GM | B | Udaipur |
| DGM | E | Pune |
| Manager | C | Meerut |
| AM | H | Indore |
| PO | D | Jaipur |
| Clerk | F | Haridwar |

The one who is designated as clerk ( F ) is belongs to Haridwar.

## S26. Ans.(b)

Sol.

| Designation | Persons | Cities |
| :---: | :---: | :---: |
| CFO | A | Agra |
| ED | G | Mathura |
| GM | B | Udaipur |
| DGM | E | Pune |
| Manager | C | Meerut |
| AM | H | Indore |
| PO | D | Jaipur |
| Clerk | F | Haridwar |

The one who belongs to Meerut ( C ) is designated as Manager.

S27. Ans.(c)
Sol.

| Designation | Persons | Cities |
| :---: | :---: | :---: |
| CFO | A | Agra |
| ED | G | Mathura |
| GM | B | Udaipur |
| DGM | E | Pune |
| Manager | C | Meerut |
| AM | H | Indore |
| PO | D | Jaipur |
| Clerk | F | Haridwar |

Four persons are designated between the one who belongs to Agra (A) and the one who is designated as just senior to $D(H)$.

S28. Ans.(e)
Sol.

| Designation | Persons | Cities |
| :---: | :---: | :---: |
| CFO | A | Agra |
| ED | G | Mathura |
| GM | B | Udaipur |
| DGM | E | Pune |
| Manager | C | Meerut |
| AM | H | Indore |
| PO | D | Jaipur |
| Clerk | F | Haridwar |

All statements are true.
S29. Ans.(c)
Sol.


Aman starting point

S30. Ans.(a)
Sol.


Aman starting point

S32. Ans.(b)
Sol.



Five persons sit between $R$ and $Y$ when counted from the left of $Y$.

S35. Ans.(d)
Sol.


Only statement (d) is not true.
S36. Ans.(a)
Sol.


S37. Ans.(e)
Sol.


All the given pair of persons sit adjacent to each other except in option (e).

Sol.


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S39. Ans.(c)
Sol.


S40. Ans.(d)
Sol.


S41. Ans.(b)
Sol.
Let marks scored by $Q$ be $5 x$
And marks scored by $\mathrm{P}=5 x \times \frac{120}{100}=6 x$
ATQ.
$(5 x+4)+(6 x+4)=80 \times \frac{120}{100}$
$11 x+8=96$
$11 x=88$
$x=8$
Marks scored by $\mathrm{P}=8 \times 6=48$

## S42. Ans.(a)

## Sol.

Let total votes in the city be 100x
Valid votes $=75 \mathrm{x}$
Winning candidate got votes $=75 x \times \frac{8}{15}=40$
Required percentage $=\frac{40 x}{100 x} \times 100=40 \%$

## S43. Ans.(d)

## Sol.

Time taken by $Q$ to complete the work $=30 \times \frac{100}{150}=20$ days
Total work (L.C.M. of $30 \& 20$ ) $=60$ units
Efficiency of $P$ \& $Q$ is 2 units/day and 3 units/ day respectively.
ATQ.
5 units work completed in 2 days
So, 60 units work completes in 24 days

## S44. Ans.(e)

Sol.
Let income of P and Q is $2 \mathrm{x} \& 3 \mathrm{x}$ respectively
And expenditure of $P$ and $Q$ is $5 y \& 6 y$ respectively
Income of Q is increased by $50 \%$
New income of $Q=3 x \times \frac{150}{100}=4.5 x$
ATQ.
$4.5 x-6 y=12000 \ldots$ (i)
$2 x-5 y=3000$
From (i) \& (ii)
$x=4000, y=1000$


Income of $\mathrm{P}=2 x=2 \times 4000=$ Rs. 8000

## S45. Ans.(d)

## Sol.

Quantity of milk $=120 \times \frac{7}{12}=70$ litres
Quantity of Water $=120-70=50$ litres
ATQ.
$70-(X+15) \times \frac{7}{12}+8-\left(50-(X+15) \times \frac{5}{12}\right)=20$
$28-(X+15) \times \frac{1}{6}=20$
$8=(X+15) \times \frac{1}{6}$
$48-15=X$
$X=33$

S46. Ans.(c)

## Sol.

In company D, total number of employees in March $=\mathrm{X}$
$X+400-220=900$
$\mathrm{X}=720$
Total number of employees joined in March in all the companies $=720 \times \frac{100}{24}=3000$

| Companies | Number of <br> employees <br> joined in March | Number of <br> employees <br> remained at the end <br> of November |
| :--- | :--- | :--- |
| A | 600 | 700 |
| B | 900 | 1100 |
| C | 780 | 900 |
| D | 720 | 900 |

Required ratio $=720: 900=4: 5$

## S47. Ans.(a)

Sol.
In company D, total number of employees in March $=\mathrm{X}$
$X+400-220=900$
$\mathrm{X}=720$
Total number of employees joined in March in all the companies $=720 \times \frac{100}{24}=3000$

| Companies | Number of <br> employees <br> joined in March | Number of <br> employees <br> remained at the end <br> of November |
| :--- | :--- | :--- |
| A | 600 | 700 |
| B | 900 | 1100 |
| C | 780 | 900 |
| D | 720 | 900 |

Required difference $=1100-700=400$

## S48. Ans.(e)

Sol.
In company D, total number of employees in March = X
$\mathrm{X}+400-220=900$
$\mathrm{X}=720$
Total number of employees joined in March in all the companies $=720 \times \frac{100}{24}=3000$

| Companies | Number of <br> employees <br> joined in March | Number of <br> employees <br> remained at the end <br> of November |
| :--- | :--- | :--- |
| A | 600 | 700 |
| B | 900 | 1100 |
| C | 780 | 900 |
| D | 720 | 900 |

Number of females joined in March $=\frac{5}{8+5} \times 780=300$
Required percentage $=\frac{300}{900} \times 100=33.33 \%$

## S49. Ans.(d)

## Sol.

In company D, total number of employees in March $=X$
$X+400-220=900$
$\mathrm{X}=720$
Total number of employees joined in March in all the companies $=720 \times \frac{100}{24}=3000$

| Companies | Number of <br> employees <br> joined in March | Number of <br> employees <br> remained at the end <br> of November |
| :--- | :--- | :--- |
| A | 600 | 700 |
| B | 900 | 1100 |
| C | 780 | 900 |
| D | 720 | 900 |

In December, total number of employees in D $=300+900=1200$
Required $\%=\frac{1200-700}{1200} \times 100=41.66 \%$

## S50. Ans.(b)

## Sol.

In company D, total number of employees in March $=\mathrm{X}$
$\mathrm{X}+400-220=900$
$\mathrm{X}=720$
Total number of employees joined in March in all the companies $=720 \times \frac{100}{24}=3000$

| Companies | Number of <br> employees <br> joined in March | Number of <br> employees <br> remained at the end <br> of November |
| :--- | :--- | :--- |
| A | 600 | 700 |
| B | 900 | 1100 |
| C | 780 | 900 |
| D | 720 | 900 |

Required average $=\frac{700+1100+900+900}{4}=900$

## S51. Ans.(a)

## Sol.

Speed of train B=54 $\times \frac{5}{18}=15 \mathrm{~m} / \mathrm{s}$
Let the length of train $A$ and train $B$ be 21L and 19L respectively.
$S-15=\frac{(21+19) L}{16} \ldots$. (i)
$S=\frac{30+21 L}{6} \ldots \ldots$ (ii)
Solving (i) and (ii)
$\mathrm{S}=40 \mathrm{~m} / \mathrm{s}$

## S52. Ans.(d)

## Sol.

ATQ, $\frac{6000 \times 12}{7000 \times(12-\mathrm{X})}=\frac{12}{7}$
$6=12-X$
$\mathrm{X}=6$ Months

## S53. Ans.(e)

Sol.
Let the present age of $A$ and $B$ be $2 x+2$ and $3 x+2$ respectively.
$\frac{2 x+2+6}{3 x+2+6}=\frac{6}{7}$
$\mathrm{x}=2$
Present age of $C=3 x+2+6=6+2+6=14$ years

## S54. Ans.(c)

## Sol.

Let $Y$ be 100 m .
So, $X=175 \mathrm{~m}$
$\frac{175 \mathrm{~m}+100 \mathrm{~m}+175 \mathrm{~m}-60}{3}=340$
$450 \mathrm{~m}-60=1020$
$450 \mathrm{~m}=1080$
$\mathrm{m}=2.4$
$\mathrm{Y}: \mathrm{Z}=100 \mathrm{~m}: 175 \mathrm{~m}-60=240: 360=2: 3$

## S55. Ans.(c)

Sol.
ATQ,
$\frac{100-D}{120-2 \mathrm{D}}=\frac{5}{2}$
$\mathrm{D}=50$
Selling price of copy $=120-100=\mathrm{Rs} .20$

## S56. Ans.(e)

## Sol.

Let the speed of stream and speed of boat in still water is $y \mathrm{~km} / \mathrm{hr}$ and $\mathrm{x} \mathrm{km} / \mathrm{hr}$ respectively.
ATQ,
$\frac{40}{2.5}=x+y \ldots$.... 1 )
$\frac{56-40}{2}=x-y$
$\mathrm{x}=12 \mathrm{~km} / \mathrm{hr}, \mathrm{y}=4 \mathrm{~km} / \mathrm{hr}$
Quantity I.
Distance $=5 \times\left(4 \times \frac{120}{100}+12\right)=84 \mathrm{~km}$

## Quantity II.

Distance $=10.5 \times(12-4)=84 \mathrm{~km}$

## Quantity I = Quantity II

## S57. Ans.(a)

## Sol.

Let the share given to $A$ and $B$ be $5 x$ and $8 x$ respectively.
$6816=\frac{5 x \times 7 \times 6}{100}+5 \mathrm{x}$
$\mathrm{x}=960$
Quantity I.
B gets $8 \mathrm{x}=$ Rs. 7680
Quantity I> Quantity II

## S58. Ans.(b)

Sol.
Let the breadth of the rectangle be 100 x .
So, side of the square $=120 \mathrm{x}$
Length of the rectangle $=120 \mathrm{x}+1$
ATQ,
$2 \times(120 \mathrm{x}+1+100 \mathrm{x})=120 \mathrm{x} \times 4-6$
$\mathrm{x}=\frac{1}{5}$

## Quantity I

Area of rectangle $=(25 \times 20)=500 \mathrm{~m}^{2}$ Quantity II
Radius of circle $=24-10=14$ meters
Area of circle $=\frac{22}{7} \times 14 \times 14=616 \mathrm{~m}^{2}$
Quantity I < Quantity II

## S59. Ans.(a)

## Sol.

Let the efficiency of N pipes are x . $\mathrm{N}(\mathrm{N}-2) \times \mathrm{x}=(\mathrm{N}-2)(\mathrm{N}-8) \times 3 \mathrm{x}$
$\mathrm{N}^{2}-2 \mathrm{~N}=3 \mathrm{~N}^{2}-24 \mathrm{~N}-6 \mathrm{~N}+48$
$\mathrm{N}^{2}-14 \mathrm{~N}+24=0$
$\mathrm{N}=12$, 2
So, $\mathrm{N}=12$
If $\mathrm{N}=2$, then times become zero
Hence, we can't take 2 as N
Quantity I: N=12
Quantity II< Quantity I

## S60. Ans.(a)

Sol.
ATQ, Product of roots $=\frac{c}{a}=\frac{15}{4}$
$4 \mathrm{x}^{2}-\mathrm{bx}+15=0$
$4 \times\left(\frac{3}{2}\right)^{2}-\mathrm{b}\left(\frac{3}{2}\right)+15=0$
$18-3 b+30=0$
$\mathrm{b}=16$


## Quantity I:

Value of $(a+b)=4+16=20$
Quantity II:
Value of $(a+c)=4+15=19$
Quantity I > Quantity II

## S61. Ans.(a)

## Sol.

Let the quantity of milk and water in A be 5 x and 2 x respectively.
The quantity milk and syrup in $B$ is $2 y$ and $y$ respectively.
Quantity of water in C is 2 x .
ATQ,
$2 y+28 \times \frac{5}{7}=40$
$y=10$
$\frac{60}{100} \times$ initial quantity of syrup $=151$
initial quantity of syrup in $C=25 \mathrm{l}$
Total quantity in vessel $C=\frac{2 \mathrm{y}+\mathrm{y}}{6} \times 13=651$
Quantity of water in $C=65-25=40$
$2 \mathrm{x}=40$
$20=\mathrm{x}$
Initially

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 100 | 40 |  |
| B | 20 |  | 10 |
| C |  | 40 | 25 |

Final

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 80 | 32 |  |
| B | 40 | 8 | 10 |
| C |  | 24 | 15 |

Required ratio $=140: 24=35: 6$

## S62. Ans.(a)

Sol.
Let the quantity of milk and water in A be 5 x and 2 x respectively.
The quantity milk and syrup in $B$ is $2 y$ and $y$ respectively.
Quantity of water in $C$ is 2 x .
ATQ,
$2 y+28 \times \frac{5}{7}=40$
$y=10$
$\frac{60}{100} \times$ initial quantity of syrup $=151$
initial quantity of syrup in $\mathrm{C}=25 \mathrm{l}$

Total quantity in vessel $C=\frac{2 y+y}{6} \times 13=651$
Quantity of water in $C=65-25=40$
$2 \mathrm{x}=40$
$20=x$
Initially

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 100 | 40 |  |
| B | 20 |  | 10 |
| C |  | 40 | 25 |

Final

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 80 | 32 |  |
| B | 40 | 8 | 10 |
| C |  | 24 | 15 |

Required Sum $=80+32+40+8+10+24+15=209$ litres

## S63. Ans.(a)

## Sol.

Let the quantity of milk and water in $A$ be $5 x$ and $2 x$ respectively.
The quantity milk and syrup in $B$ is $2 y$ and $y$ respectively.
Quantity of water in $C$ is $2 x$.
ATQ,
$2 y+28 \times \frac{5}{7}=40$
$y=10$
$\frac{60}{100} \times$ initial quantity of syrup $=15 \mathrm{l}$
initial quantity of syrup in $C=251$
Total quantity in vessel $C=\frac{2 y+y}{6} \times 13=651$
Quantity of water in $\mathrm{C}=65-25=40$
$2 \mathrm{x}=40$
$20=\mathrm{x}$
Initially

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 100 | 40 |  |
| B | 20 |  | 10 |
| C |  | 40 | 25 |

## Final

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 80 | 32 |  |
| B | 40 | 8 | 10 |
| C |  | 24 | 15 |

Required percentage $=\frac{32}{10} \times 100=320 \%$

## S64. Ans.(d)

## Sol.

Let the quantity of milk and water in A be 5 x and 2 x respectively.
The quantity milk and syrup in $B$ is $2 y$ and $y$ respectively.
Quantity of water in C is 2 x .
ATQ,
$2 y+28 \times \frac{5}{7}=40$
$y=10$
$\frac{60}{100} \times$ initial quantity of syrup $=151$
initial quantity of syrup in $C=25 \mathrm{l}$
Total quantity in vessel $C=\frac{2 y+y}{6} \times 13=651$
Quantity of water in $C=65-25=40$
$2 \mathrm{x}=40$
$20=x$
Initially

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 100 | 40 |  |
| B | 20 |  | 10 |
| C |  | 40 | 25 |

## Final

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 80 | 32 |  |
| B | 40 | 8 | 10 |
| C |  | 24 | 15 |

Required ratio $=24: 10=12: 5$

## S65. Ans.(e)

## Sol.

Let the quantity of milk and water in $A$ be $5 x$ and $2 x$ respectively.
The quantity milk and syrup in $B$ is $2 y$ and $y$ respectively.
Quantity of water in C is 2 x .
ATQ,
$2 y+28 \times \frac{5}{7}=40$
$y=10$
$\frac{60}{100} \times$ initial quantity of syrup $=151$
initial quantity of syrup in $\mathrm{C}=25 \mathrm{l}$
Total quantity in vessel $C=\frac{2 \mathrm{y}+\mathrm{y}}{6} \times 13=651$
Quantity of water in $C=65-25=40$
$2 \mathrm{x}=40$
$20=\mathrm{x}$

## Initially

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 100 | 40 |  |
| B | 20 |  | 10 |
| C |  | 40 | 25 |

Final

| Vessels | Milk | Water | Syrup |
| :--- | :--- | :--- | :--- |
| A | 80 | 32 |  |
| B | 40 | 8 | 10 |
| C |  | 24 | 15 |

Required sum $=100+40+24+15=179$

## S66. Ans.(d)

## Sol.

Pattern of the series -


## S67. Ans.(a)

Sol. Pattern of the series -

| 100 | 325 |  | 69 | 358 | 34 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| +225 | -256 | +289 | -324 | +361 |  |  |
| $\uparrow$ | $\uparrow$ | $\uparrow$ | $\uparrow$ | $\uparrow$ |  |  |
| $15^{2}$ | $16^{2}$ | $17^{2}$ | $18^{2}$ | $19^{2}$ |  |  |

## S68. Ans.(c)

Sol.
Pattern of the series
$10 \times 3-9=21$
$21 \times 3-9=\mathbf{5 4}$
$54 \times 3-9=153$
$153 \times 3-9=450$
$450 \times 3-9=1341$

## S69. Ans.(a)

## Sol.

Pattern of the series -
$8 \times \frac{3}{2}=12$
$12 \times \frac{3}{2}=18$
$18 \times \frac{3}{2}=27$
$27 \times \frac{3}{2}=40.5$
$40.5 \times \frac{3}{2}=60.75$

## S70. Ans.(e)

## Sol.

Pattern of the series -
$2 \times 2+2=6$
$6 \times 3+3=21$
$21 \times 5+5=110$
$110 \times 7+7=777$
$777 \times 11+11=8558$

## S71. Ans.(d)

Sol.
Total number of flats in all the apartments $=125 \times 4=500$
$X+3 X+3 X-5+4 X-5=100$
$11 \mathrm{X}=110$
$\mathrm{X}=10$
For apartment A,
Total number of flats in apartment $A=10 \%$ of $500=50$
Ratio of total 2BHK flats to 1 BHK flats $=\frac{25}{100}: 1=1: 4$
2BHK flats in apartment $\mathrm{A}=\frac{1}{5} \times 50=10$
1BHK flats in apartment $\mathrm{A}=\frac{4}{5} \times 50=40$
Similarly,

| Apartments | Total number <br> of flats | Total number <br> of 1BHK flats | Total number <br> of 2BHK flats |
| :---: | :---: | :---: | :---: |
| A | 50 | 40 | 10 |
| B | 150 | 100 | 50 |
| C | 125 | 100 | 25 |
| D | 175 | 125 | 50 |

Required ratio $=(25+50): 40=15: 8$

## S72. Ans.(e)

## Sol.

Total number of flats in all the apartments $=125 \times 4=500$
$X+3 X+3 X-5+4 X-5=100$
$11 \mathrm{X}=110$
$\mathrm{X}=10$
For apartment A,
Total number of flats in apartment $\mathrm{A}=10 \%$ of $500=50$
Ratio of total 2BHK flats to 1 BHK flats $=\frac{25}{100}: 1=1: 4$
2BHK flats in apartment $A=\frac{1}{5} \times 50=10$
1BHK flats in apartment $\mathrm{A}=\frac{4}{5} \times 50=40$

Similarly,

| Apartments | Total number <br> of flats | Total number <br> of 1BHK flats | Total number <br> of 2BHK flats |
| :---: | :---: | :---: | :---: |
| A | 50 | 40 | 10 |
| B | 150 | 100 | 50 |
| C | 125 | 100 | 25 |
| D | 175 | 125 | 50 |

1BHK flats in apartment $\mathrm{E}=\frac{130}{100} \times 100=130$
2 BHK flats in apartment $E=\frac{80}{100} \times 50=40$
Total flats in $\mathrm{E}=130+40=170$

## S73. Ans.(d)

Sol.
Total number of flats in all the apartments $=125 \times 4=500$
$\mathrm{X}+3 \mathrm{X}+3 \mathrm{X}-5+4 \mathrm{X}-5=100$
$11 \mathrm{X}=110$
$\mathrm{X}=10$
For apartment A,
Total number of flats in apartment $\mathrm{A}=10 \%$ of $500=50$
Ratio of total 2 BHK flats to 1 BHK flats $=\frac{25}{100}: 1=1: 4$
2BHK flats in apartment A $=\frac{1}{5} \times 50=10$
1BHK flats in apartment $\mathrm{A}=\frac{4}{5} \times 50=40$
Similarly,

| Apartments | Total number <br> of flats | Total number <br> of 1BHK flats | Total number <br> of 2BHK flats |
| :---: | :---: | :---: | :---: |
| A | 50 | 40 | 10 |
| B | 150 | 100 | 50 |
| C | 125 | 100 | 25 |
| D | 175 | 125 | 50 |

Required difference $=100-50=50$

## S74. Ans.(a)

## Sol.

Total number of flats in all the apartments $=125 \times 4=500$
$\mathrm{X}+3 \mathrm{X}+3 \mathrm{X}-5+4 \mathrm{X}-5=100$
$11 \mathrm{X}=110$
$\mathrm{X}=10$
For apartment A,
Total number of flats in apartment $\mathrm{A}=10 \%$ of $500=50$
Ratio of total 2BHK flats to 1 BHK flats $=\frac{25}{100}: 1=1: 4$
2BHK flats in apartment $\mathrm{A}=\frac{1}{5} \times 50=10$

Similarly,

| Apartments | Total number <br> of flats | Total number <br> of 1BHK flats | Total number <br> of 2BHK flats |
| :---: | :---: | :---: | :---: |
| A | 50 | 40 | 10 |
| B | 150 | 100 | 50 |
| C | 125 | 100 | 25 |
| D | 175 | 125 | 50 |

Required percentage $=\frac{25}{150+50} \times 100=12.5 \%$

## S75. Ans.(b)

## Sol.

Total number of flats in all the apartments $=125 \times 4=500$
$X+3 X+3 X-5+4 X-5=100$
$11 \mathrm{X}=110$
$\mathrm{X}=10$
For apartment A,
Total number of flats in apartment $\mathrm{A}=10 \%$ of $500=50$
Ratio of total 2 BHK flats to 1 BHK flats $=\frac{25}{100}: 1=1: 4$
2BHK flats in apartment $\mathrm{A}=\frac{1}{5} \times 50=10$
1BHK flats in apartment $\mathrm{A}=\frac{4}{5} \times 50=40$
Similarly,

| Apartments | Total number <br> of flats | Total number <br> of 1BHK flats | Total number <br> of 2BHK flats |
| :---: | :---: | :---: | :---: |
| A | 50 | 40 | 10 |
| B | 150 | 100 | 50 |
| C | 125 | 100 | 25 |
| D | 175 | 125 | 50 |

Total 2BHK flats $=25$
2BHK flats that are in under-construction $=\frac{20}{100} \times 25=5$
2 BHK flats that are not booked $=\frac{10}{100} \times(25-5)=2$
Flats that are booked in apartment $\mathrm{C}=100+18=118$

## S76. Ans.(a)

Sol.
(i). $12 \mathrm{x}^{2}-11 \mathrm{x}+2=0$
$12 \mathrm{x}^{2}-8 \mathrm{x}-3 \mathrm{x}+2=0$
$4 x(3 x-2)-1(3 x-2)=0$
$\mathrm{x}=\frac{2}{3}, \frac{1}{4}$
(ii). $(3 y+7)^{2}=1$
$(3 y+7)= \pm 1$
$\Rightarrow \mathrm{y}=-2,-\frac{8}{3}$
So, $x>y$

S77. Ans.(e)
Sol.
(i). $3 x^{2}-5 x-2=0$
$3 x^{2}-6 x+x-2=0$
$3 x(x-2)+1(x-2)=0$
$(x-2)(3 x+1)=0$
$\mathrm{x}=2,-\frac{1}{3}$
(ii) $10 \mathrm{y}^{2}+7 \mathrm{y}+1=0$
$10 y^{2}+5 y+2 y+1=0$
$5 y(2 y+1)+1(2 y+1)=0$
$\mathrm{y}=-\frac{1}{2}, \frac{-1}{5}$
No relation

## S78. Ans.(e)

## Sol.

(i). $x^{2}-16 x+48=0$
$\mathrm{x}^{2}-12 \mathrm{x}-4 \mathrm{x}+48=0$
$x(x-12)-4(x-12)=0$
$(x-12)(x-4)=0$
$\therefore \mathrm{x}=12,4$
(ii). $2 \mathrm{y}^{2}-13 \mathrm{y}+18=0$
$2 \mathrm{y}^{2}-4 \mathrm{y}-9 \mathrm{y}+18=0$
$2 y(y-2)-9(y-2)=0$
$(2 y-9)(y-2)=0$
$\therefore y=\frac{9}{2}, 2$
No relation
S79. Ans.(d)

## Sol.


(i). $\frac{10}{x^{2}}-\frac{13}{\mathrm{x}}+4=0$
$\Rightarrow 4 \mathrm{x}^{2}-13 \mathrm{x}+10=0$
$\Rightarrow 4 \mathrm{x}^{2}-8 \mathrm{x}-5 \mathrm{x}+10=0$
$4 \mathrm{x}(\mathrm{x}-2)-5(\mathrm{x}-2)=0$
$(4 x-5)(x-2)=0$
$\mathrm{x}=\frac{5}{4}, 2$
(ii). $\frac{14}{\mathrm{y}^{2}}+2=\frac{11}{\mathrm{y}}$
$\Rightarrow 2 \mathrm{y}^{2}-11 \mathrm{y}+14=0$
$\Rightarrow 2 y^{2}-7 y-4 y+14=0$
$\Rightarrow 2 y^{2}-7 y-4 y+14=0$
$\Rightarrow y(2 y-7)-2(2 y-7)=0$
$\mathrm{y}=2, \frac{7}{2}$

$y \geq x$

## S80. Ans.(e)

## Sol.

(i). $5 \mathrm{x}^{2}-4 \mathrm{x}-28=0$
$5 \mathrm{x}^{2}+10 \mathrm{x}-14 \mathrm{x}-28=0$
$x=\frac{14}{5},-2$
(ii). $8 \mathrm{y}^{2}-6 \mathrm{y}-9=0$
$8 y^{2}+12 y-6 y-9=0$
$\mathrm{y}=\frac{3}{2},-\frac{3}{4}$
So, no relation

## S81. Ans.(a)

Sol. The word that is spelled incorrectly is "audaciuos" which should be spelled as "audacious."
Here are the meanings of the highlighted words:
A. Audacious - showing a willingness to take bold risks.
B. Embarked - begin (a course of action)
C. Perilous - full of danger or risk
D. Formidable - inspiring fear or respect through being impressively large or powerful.

## S82. Ans.(b)

Sol. The word that is spelled incorrectly is "jagron". The correct spelling of the word is "jargon."
Here are the meanings of the highlighted words:
A. Convoluted - extremely complex and difficult to follow
B. Jargon - special words or expressions used by a profession or group that are difficult for others to understand
C. Contract - a written or spoken agreement that is intended to be enforceable by law
D. Decipher - convert (a text written in code, or a coded signal) into normal language.

## S83. Ans.(c)

Sol. The word that is spelled incorrectly is "paradigme". The correct spelling of the word is "paradigm." Here are the meanings of the highlighted words:
A. Ubiquitous - present, appearing or found everywhere
B. Catalyzed - cause or accelerate (a reaction) by acting as a catalyst
C. Paradigm - a typical example or pattern of something; a model
D. Communicate - share or exchange information, news, or ideas.

## S84. Ans.(d)

Sol. The word that is spelled incorrectly is "disparging," which should be spelled as "disparaging."
Here are the meanings of the highlighted words:
A. Garrulous - excessively talkative, especially on trivial matters
B. Bombastic - high-sounding but with little meaning; inflated
C. Extolling - praise enthusiastically
D. Disparaging - expressing the opinion that something is of little worth; derogatory

## S85. Ans.(b)

Sol. The word that is spelled incorrectly is "prodigous," which should be spelled as "prodigious."
Here are the meanings of the highlighted words:
A. Magnanimous - very generous or forgiving, especially toward a rival or someone less powerful than oneself
B. Prodigious - remarkably or impressively great in extent, size, or degree
C. Curing - the process of eliminating a disease or condition from the body
D. Altruistic - showing a selfless concern for the well-being of others; unselfish

## S86. Ans.(a)

Sol. Among the given options, only statement (a) is correct based on the information given in the passage. While the rest of the statements are incoherent with reference to the context of the given question. Refer to the third line of the first paragraph, "Mustard oil is an important agricultural commodity in both Russia and Ukraine, with significant production and export capabilities. However, since the start of the conflict, the trade routes between the two countries have been severely disrupted, making it difficult for farmers and producers to transport their goods across the border."

## S87. Ans.(b)

Sol. Among the given options, only statement (b) is correct, while the rest of the statements are incoherent. Refer to the starting line of the second paragraph, "The war has also exacerbated existing tensions and divisions within both Russia and Ukraine, as well as among their allies and international partners." This means that the conflict has not only created issues between the two countries but also created tension between other nations with different viewpoints on the matter.

## S88. Ans.(b)

Sol. Here, only statement (iii) is correct. Refer to the second line of the third paragraph which states that some consumers have turned to alternative sources of oils with similar properties, such as olive oil, as a result of the shortage. While the rest of the statements are incoherent based on the given information.

## S89. Ans.(a)

Sol. By referring to the information provided in the given passage, we can infer that only statement (a) is correct. According to the passage, option (a) is correct, as consumers have had to pay more for mustard oil due to the surge in prices. Option (b) is incorrect, as the shortage of mustard oil caused by the RussiaUkraine conflict has increased the demand for alternative oils, such as rapeseed and sunflower oil. Option (c) is incorrect, as the shortage of mustard oil has had an impact on the global economy, particularly on countries that rely heavily on imports from Russia and Ukraine.

## S90. Ans.(d)

Sol. Among the given alternatives, only option (d) is correct with reference to the context of the given question. The war has had a significant impact on the farmers and producers of mustard oil in both Russia and Ukraine, with the disruption of trade routes making it difficult for them to transport their goods and affecting their productivity.

## S91. Ans.(d)

Sol. The idiomatic phrase that best conveys the intended meaning of the word "compromise" in the given passage is (d) Meet halfway. This phrase means to reach a compromise or agreement by both parties making concessions and finding a solution that is acceptable to both. It suggests that both sides should be willing to give up something in order to come to an agreement, which is the essence of compromise.
(a) "Go for broke" means to risk everything in pursuit of a goal, which is not related to compromising.
(b) "All or nothing" means to have or do everything, without compromise or moderation. This phrase is actually the opposite of compromise.
(c) "Stand your ground" means to maintain your position or opinion, without giving in to others. This phrase also does not convey the idea of compromise, which involves both sides giving in to some extent. (e) "Dig in your heels" means to refuse to change your position or opinion, which is again opposite to the concept of compromise.

## S92. Ans.(a)

Sol. According to the given passage, diplomatic efforts and a commitment to dialogue and compromise can bring an end to the Russia-Ukraine conflict. Refer to the concluding lines of the second paragraph for more clarity.

## S93. Ans.(d)

Sol. The word that is most opposite in meaning to "rely," as highlighted in the given passage, is (d) wariness. "Rely" means to depend on or trust in something or someone, while "wariness" means caution, suspicion, or distrust. If you are wary of something or someone, you are not willing to rely on them, and if you rely on something or someone, you are not wary of them. Therefore, "wariness" is the most opposite in meaning to "rely" among the given options. The other options are not directly opposite to "rely" and do not convey a sense of distrust or caution. "Conviction," "aphorism," "precept," and "credence" are related to belief, opinion, or principle and do not convey the opposite meaning of "rely."

## S94. Ans.(c)

Sol. Part (C) has a grammatical error. The subject of the sentence is "beach," which is singular. Therefore, the verb that follows should also be singular. However, the verb "have" in part ( C ) is plural, which does not agree with the subject. To make the sentence grammatically correct, we could change "have" to "has" to agree with the singular subject "beach".

## S95. Ans.(b)

Sol. Part (B) of the sentence has a grammatical error. The phrase "the weather had not ideal" is incorrect and we should use the verb "was" to describe the state of the weather. Therefore, we could correct the sentence as: "Despite the fact that the weather was not ideal, the group decided to proceed with the planned hiking trip."

## S96. Ans.(e)

Sol. There is no grammatical error in the given sentence.

## S97. Ans.(c)

Sol. Part (C) of the sentence has a grammatical error. The phrase "decided try" should be corrected to "decided to try," as "to" is needed after the verb "decided" to indicate the infinitive form of the verb "try."

## S98. Ans.(c)

Sol. Part (C) of the sentence has a grammatical error. The phrase "she never imagined she will end" should be corrected to "she never imagined she would end," using the past tense "would" instead of "will" to maintain grammatical consistency with the past tense "had always dreamed" in Part (A).

## S99. Ans.(a)

Sol. Part (A) of the sentence has a grammatical error. The correct phrase should be "Obesity is a complex health issue," using the article "a" before "complex" to indicate that "complex health issue" is a singular countable noun phrase.

## S100. Ans.(c)

Sol. Part (C) of the sentence has a grammatical error. The verb "demand" in Part (C) needs to be changed to "demands" to maintain subject-verb agreement with "healthcare inequality" in Part (A). "Healthcare inequality" is a singular subject and requires a singular verb.

## S101. Ans.(b)

Sol. The words that should fill in the blanks are:
"Despite" the fact that we come from different backgrounds and have different opinions, we can "still" work together towards a common goal.
This sentence means that even though there are differences in backgrounds and opinions, it is still possible to work towards a common goal. "Despite" means "in spite of" or "regardless of". "Still" means "nevertheless" or "even so".
(a) "Because of" implies that differences in backgrounds and opinions could make it easier to work together, which is not necessarily the case in this sentence.
(c) "Due to" and "unless" don't fit the sentence grammatically or semantically.
(d) "However" could work instead of "Despite", but "even" doesn't fit the second blank as well as "still" does.
(e) "Since" implies a reason or cause for working together, which isn't the focus of the sentence. "Anyhow" means "anyway" or "in any case", but it doesn't fit the sentence here.

## S102. Ans.(c)

Sol. The sentence should be filled with option (c) "By, throughout." This is because the first part of the sentence talks about how taking a few minutes to plan one's day and set goals can increase productivity, which means that the second blank should show the result of this action. "Throughout" is the appropriate word as it means during the entire time or from beginning to end, indicating that the planning helped the person stay productive and focused throughout the day.

## S103. Ans.(d)

Sol. The sentence should be filled with option (d) "With, anything." This is because the first part of the sentence talks about having the right attitude, which means that the second blank should show the potential outcome of having a positive attitude. "Anything" is the appropriate word as it means any possible thing or everything, indicating that with the right attitude and a little bit of luck, anything is possible in life.

## S104. Ans.(b)

Sol. The most appropriate words to fill in the given blanks are: (b) During, with. This choice makes the most sense because it indicates that during the summer, the person likes to go swimming in the lake and spend time during that period with their family. "During" indicates a specific time frame, while "with" indicates who they will be spending time with.

## S105. Ans.(d)

Sol. The correct option to fill in the blanks is (d) Before, by. The sentence "Before going to the party, I stopped by the store to pick up some snacks and drinks" implies that the speaker made a stop at the store to buy some snacks and drinks prior to going to the party. The word "before" indicates the sequence of events, where the action of stopping at the store came before the action of going to the party.
The preposition "by" in this context means "at" or "near," indicating the location of the store in relation to the speaker's path. So, "I stopped by the store" means "I made a quick stop at the store while on my way to the party."

## S106. Ans.(b)

Sol. The most appropriate option is: (b) to, on. Thus, the sentence becomes: "In addition to studying for my exam, I need to work on my research paper." Here, "to" and "on" are the best fillers in the sentence because they provide the necessary information about the actions that need to be taken and the specific task that needs to be worked on.

## S107. Ans.(d)



Sol. The most appropriate answer is: (d) any, into. Thus, the sentence becomes: "Without any hesitation, she jumped into the pool and swam to the other side." The word "any" is used to indicate that there was no hesitation at all. And the word "into" is used to indicate the direction of the jump - from outside the pool to inside the pool.

## S108. Ans.(a)

Sol. Among the given alternatives, sentence (D) best defines the theme of the paragraph and thus it is the introductory sentence of the paragraph. Now, sentence (D) is followed by sentence (F) which states further that inflation has a significant impact on the overall economic conditions of a country. Now, sentence ( $F$ ) is followed by sentence (A) which explains how inflation impacts economic conditions. Now, sentence (A) is followed by sentence (C) which states the consequences of inflation. Now, sentence (C) is followed by sentence (E) which explains how businesses respond to the consequences of inflation. Finally, sentence (B) concludes the paragraph by stating that if inflation continues to rise, it can lead to hyperinflation. Thus, the correct rearrangement of the given sentences would be DFACEB.

## S109. Ans.(c)

Sol. Among the given alternatives, sentence (D) best defines the theme of the paragraph and thus it is the introductory sentence of the paragraph. Now, sentence (D) is followed by sentence (F) which states further that inflation has a significant impact on the overall economic conditions of a country. Now, sentence (F) is followed by sentence (A) which explains how inflation impacts economic conditions. Now, sentence (A) is followed by sentence (C) which states the consequences of inflation. Now, sentence (C) is followed by sentence (E) which explains how businesses respond to the consequences of inflation. Finally, sentence (B) concludes the paragraph by stating that if inflation continues to rise, it can lead to hyperinflation. Thus, the correct rearrangement of the given sentences would be DFACEB.

## S110. Ans.(d)

Sol. Among the given alternatives, sentence (D) best defines the theme of the paragraph and thus it is the introductory sentence of the paragraph. Now, sentence (D) is followed by sentence (F) which states further that inflation has a significant impact on the overall economic conditions of a country. Now, sentence (F) is followed by sentence (A) which explains how inflation impacts economic conditions. Now, sentence (A) is followed by sentence (C) which states the consequences of inflation. Now, sentence (C) is followed by sentence (E) which explains how businesses respond to the consequences of inflation. Finally, sentence (B) concludes the paragraph by stating that if inflation continues to rise, it can lead to hyperinflation. Thus, the correct rearrangement of the given sentences would be DFACEB.

## S111. Ans.(e)

Sol. Among the given alternatives, sentence (D) best defines the theme of the paragraph and thus it is the introductory sentence of the paragraph. Now, sentence (D) is followed by sentence (F) which states further that inflation has a significant impact on the overall economic conditions of a country. Now, sentence (F) is followed by sentence (A) which explains how inflation impacts economic conditions. Now, sentence (A) is followed by sentence (C) which states the consequences of inflation. Now, sentence (C) is followed by sentence (E) which explains how businesses respond to the consequences of inflation. Finally, sentence (B) concludes the paragraph by stating that if inflation continues to rise, it can lead to hyperinflation. Thus, the correct rearrangement of the given sentences would be DFACEB.

## S112. Ans.(b)

Sol. Among the given alternatives, sentence (D) best defines the theme of the paragraph and thus it is the introductory sentence of the paragraph. Now, sentence (D) is followed by sentence (F) which states further that inflation has a significant impact on the overall economic conditions of a country. Now, sentence (F) is followed by sentence (A) which explains how inflation impacts economic conditions. Now, sentence (A) is followed by sentence (C) which states the consequences of inflation. Now, sentence (C) is followed by sentence (E) which explains how businesses respond to the consequences of inflation. Finally, sentence (B) concludes the paragraph by stating that if inflation continues to rise, it can lead to hyperinflation. Thus, the correct rearrangement of the given sentences would be DFACEB.

## S113. Ans.(a)

Sol. Among the given alternatives, sentence (D) best defines the theme of the paragraph and thus it is the introductory sentence of the paragraph. Now, sentence (D) is followed by sentence (F) which states further that inflation has a significant impact on the overall economic conditions of a country. Now, sentence (F) is followed by sentence (A) which explains how inflation impacts economic conditions. Now, sentence (A) is followed by sentence (C) which states the consequences of inflation. Now, sentence (C) is followed by sentence (E) which explains how businesses respond to the consequences of inflation. Finally, sentence (B) concludes the paragraph by stating that if inflation continues to rise, it can lead to hyperinflation. Thus, the correct rearrangement of the given sentences would be DFACEB.

## S114. Ans.(b)

Sol. The sentence "He's got a chip on his shoulder because he didn't get the promotion" means that the person is feeling resentful or angry because he believes he deserved the promotion but was passed over for it. Option (b) is the correct explanation of the sentence as it accurately captures the intended meaning.

## S115. Ans.(e)

Sol. The sentence "She's always looking for a silver lining, even in the toughest of situations" means that the person is optimistic and tries to find something positive even in difficult situations. Option (e) is the correct explanation of the sentence as it accurately captures the intended meaning.

## S116. Ans.(b)

Sol. The sentence "She was walking on thin ice when she started criticizing her boss" means that the person was taking a significant risk by criticizing her boss and may face negative consequences. Option (b) is the correct explanation of the sentence as it accurately captures the intended meaning.

## S117. Ans.(b)

Sol. The correct option is (b) "I'm extremely busy with work this week, but I'm hopeful that I'll be able to catch up over the weekend." This means that the speaker has a lot of work to do this week and is feeling overwhelmed, but he is optimistic that he will be able to complete everything over the weekend.

## S118. Ans.(c)

Sol. The phrase "cool as a cucumber" is commonly used to describe someone who remains calm and composed in a difficult or stressful situation. Only option (c) accurately captures the intended meaning of the sentence, which is that the person remained composed when faced with a challenging task.

## S119. Ans.(c)

Sol. Option (c) is the correct explanation: "I'm going to face a difficult situation and ask my boss for a raise." The phrase "bite the bullet" is an idiom that means to face a difficult or unpleasant situation with courage and determination. In this context, the speaker is using this idiom to say that they are going to face the potentially uncomfortable situation of asking their boss for a raise. Other options are incorrect as they offer literal interpretations of the phrase "bite the bullet" that have nothing to do with the intended meaning in this context.

## S120. Ans.(a)

Sol. Option (a) is the correct interpretation. "Staying on top of things" means to stay informed and aware of everything that's happening, so that you can be prepared for unexpected situations. The other options use figurative language to describe being on top of things, but they don't convey the same meaning as the original sentence.

