

1. Three Science classes A, B and C take a Life Science test. The average score of class A is 83. The average of class B is 76. The average score of class C is 85. The average score of classes A and B is 79 and average score of classes B and C is 81. Then, the average score of classes A, B and C is
 (a) 80 (b) 80.5 (c) 81.5 (d) 81

Sol. (c) Let the number of students in classes A, B and C be a , b and c respectively.

$$\therefore \text{Total score of class A} = 83a$$

$$\text{Total score of class B} = 76b$$

$$\text{Total score of class C} = 85c$$

According to the question,

$$\frac{83a + 76b}{a + b} = 79 \quad [\because \text{average of A and B} = 79]$$

$$\Rightarrow 4a = 3b \Rightarrow a = \frac{3b}{4} \quad \dots(i)$$

Again, average of B and C = 81

$$\Rightarrow \frac{76b + 85c}{b + c} = 81 \Rightarrow 5b = 4c \Rightarrow c = \frac{5b}{4} \quad \dots(ii)$$

$$\begin{aligned} \therefore \text{Average of A, B and C} &= \frac{83a + 76b + 85c}{a + b + c} \\ &= \frac{83 \times \frac{3b}{4} + 76b + 85 \times \frac{5b}{4}}{\frac{3b}{4} + b + \frac{5b}{4}} \end{aligned}$$

$$= \frac{249b + 304b + 425b}{3b + 4b + 5b} = \frac{978b}{12b} = 81.5$$

2. In a library the ratio of story books and other books is 7 : 2 and there are 1512 story books. Due to collection of some more story books the said ratio becomes 15 : 4. The number of story books collected is

- (a) 100 (b) 97 (c) 108 (d) 205

Sol. (c) Let the number of story books and other books are $7x$ and $2x$, respectively.

Then, according to the question,

$$7x = 1512 \Rightarrow x = 216$$

Let number of story books collected be n .

Then, again, according to the question,

$$\begin{aligned} \frac{7x + n}{2x} &= \frac{15}{4} \\ \Rightarrow \frac{1512 + n}{432} &= \frac{15}{4} \quad [\because 7x = 1512 \text{ and } x = 216] \end{aligned}$$

$$\Rightarrow 6048 + 4n = 6480 \Rightarrow 4n = 432 \Rightarrow n = 108$$

3. A and B have their monthly incomes in the ratio 8 : 5, while their monthly expenditures are in the ratio 5 : 3. If they have saved ₹ 12000 and ₹ 10000 monthly respectively, then the difference in their monthly incomes is
 (a) ₹ 52000 (b) ₹ 46000 (c) ₹ 44000 (d) ₹ 42000

Sol. (d) Let A's and B's monthly income be $8x$ and $5x$, and expenditure be $5y$ and $3y$.

$$\therefore 8x - 5y = 12000$$

$$\text{and } 5x - 3y = 10000$$

From Eqs. (i) and (ii), we get

$$x = 14000 \text{ and } y = 20000$$

$$\therefore \text{A's income} = 8x = 8 \times 14000 = ₹ 112000$$

$$\text{B's income} = 5x = 5 \times 14000 = ₹ 70000$$

$$\therefore \text{Difference} = 112000 - 70000 = ₹ 42000$$

4. A farmer travelled a distance of 61 km in 9 h. He travelled partly on foot at the rate 4 km/h and partly on bicycle at the rate 9 km/h. The distance travelled on foot is

- (a) 14 km (b) 15 km (c) 16 km (d) 17 km

Sol. (c) Let the farmer covered d km on foot. Then, according to the question,

$$\frac{d}{4} + \frac{61-d}{9} = 9 \quad \left[\because \text{Time} = \frac{\text{Distance}}{\text{Speed}} \right]$$

$$\Rightarrow \frac{9d + 244 - 4d}{36} \Rightarrow 5d + 244 = 324$$

$$\Rightarrow 5d = 80 \Rightarrow d = 16 \text{ km}$$

5. A sum of ₹ 7930 is divided into 3 parts and given on loan at 5% simple interest to A, B and C for 2 yr, 3 yr and 4 yr, respectively. If the amounts of all three are equal after their respective periods of loan, then the A received a loan of

- (a) ₹ 2760 (b) ₹ 3050 (c) ₹ 2800 (d) ₹ 2750

Sol. (a) Let the principal with A, B and C be a , b and c , respectively.

Now, 110% of $a = 115\%$ of $b = 120\%$ of $c = K$ (let)

$$\text{So, } a : b : c = \frac{1}{110} : \frac{1}{115} : \frac{1}{120} = \frac{1}{22} : \frac{1}{23} : \frac{1}{24}$$

$$\Rightarrow a : b : c = 23 \times 24 : 22 \times 24 : 22 \times 23 = 552 : 528 : 506$$

$$\therefore \text{Loan received by A} = \frac{552}{1586} \times 7930 = 2760$$

6. A and B can do a piece of work in 30 and 36 days, respectively. They began the work together but A leaves after some days and B finished the remaining work in 25 days. After how many days did A leave?

- (a) 6 days (b) 11 days (c) 10 days (d) 5 days

Sol. (d) A's one day's work = $\frac{1}{30}$ and B's one day's work = $\frac{1}{36}$

$$\therefore (A + B)\text{'s one day's work} = \frac{1}{30} + \frac{1}{36} = \frac{11}{180}$$

$$25 \text{ day's work of B} = \frac{25}{36}$$

$$\therefore \text{Remaining work} = 1 - \frac{25}{36} = \frac{11}{36}$$

$$\text{A and B complete the work } \frac{11}{36} \text{ in } = \frac{11}{36} \div \frac{11}{180} = 5 \text{ days}$$

So, A leaves after 5 days.

7. From 1980-90, the population of a country was increased by 20%. From 1990-2000, the population of the country was increased by 20%. From 2000-10, the population of the country was increased by 20%. Then the overall increased population (in percentage) of the country from 1980-2010 was

- (a) 60% (b) 62.8% (c) 72.2% (d) 72.8%

Sol. (d) Let the population in the year 1980 = x

Then, the population in the year 1990 = 120% of x

Then, the population in the year 2000

$$= 120\% \text{ of } 120\% \text{ of } x$$

And the population in the year 2010

$$= 120\% \text{ of } 120\% \text{ of } 120\% \text{ of } x$$

$$= \frac{120}{100} \times \frac{120}{100} \times \frac{120}{100} \times x$$

$$= \frac{6}{5} \times \frac{6}{5} \times \frac{6}{5} \times x = \frac{216}{125}x$$

Hence, required percentage

$$\frac{216x}{125} - x$$

$$= \frac{216x}{125} \times 100\%$$

$$= \frac{91}{125} \times 100\% = 72.8\%$$

8. If the product of two positive numbers be 1575 and their ratio is 7 : 9, then the greater number is

- (a) 35 (b) 63 (c) 45 (d) 135

Sol. (c) Let the numbers are $7x$ and $9x$.

According to the question,

$$7x \times 9x = 1575$$

$$63x^2 = 1575$$

$$\Rightarrow x^2 = 25 \Rightarrow x = 5$$

$$\therefore \text{Greater number} = 9x = 9 \times 5 = 45$$

9. If $A : B = 2 : 3$ and $B : C = 3 : 7$, then $A + B : B + C : C + A$ is equal to

- (a) 4 : 10 : 9 (b) 5 : 8 : 9
(c) 5 : 10 : 9 (d) 4 : 8 : 9

Sol. (c) We have, $A : B = 2 : 3$

$$B : C = 3 : 7$$

$$\therefore A : B : C = 2 : 3 : 7$$

Let $A = 2K$, $B = 3K$ and $C = 7K$

$$\therefore A + B : B + C : C + A = (2K + 3K) : (3K + 7K) : (7K + 2K)$$

$$= 5K : 10K : 9K = 5 : 10 : 9$$

10. The HCF and LCM of two number are 21 and 84, respectively. If the ratio of the two numbers is 1 : 4, then the larger of the two numbers is

- (a) 84 (b) 108 (c) 48 (d) 12

Sol. (a) Let the numbers be x and $4x$.

Product of numbers = HCF \times LCM

$$\therefore x \times 4x = 21 \times 84 \Rightarrow x^2 = 21 \times 21 \Rightarrow x = 21$$

Hence, larger number = $4x = 84$

11. A sells a cycle to B at a profit of 20% and B sells it to C at a loss of 25%. If C bought the cycle for ₹ P, then the cost price of it for A was

- (a) ₹ $\frac{9}{10}P$ (b) ₹ $\frac{10}{9}P$ (c) ₹ $\frac{1}{20}P$ (d) ₹ $\frac{9}{20}P$

Sol. (b) Let the CP for A = ₹ x, then

According to the question,

$$\begin{aligned} &75\% \text{ of } 120\% \text{ of } x = P \\ \Rightarrow &x \times \frac{120}{100} \times \frac{75}{100} = P \\ \Rightarrow &x \times \frac{6}{5} \times \frac{3}{4} = P \\ \Rightarrow &x = ₹ \frac{10}{9}P \end{aligned}$$

12. A number when divided by 361 gives a remainder 47. If the same number is divided by 19, then the remainder obtained is

- (a) 8 (b) 1 (c) 3 (d) 9

Sol. (d) Let the number = $N = 361K + 47$

$$= 361K + 38 + 9 = 19(19K + 2) + 9$$

$$\therefore \frac{N}{19} = \frac{19(K+2)+9}{19}$$

\therefore Required remainder = 9

13. If 64 buckets of water are removed from a cubical shaped water tank completely filled with water, $\frac{1}{3}$ of the tank remains filled with water. The length of each side of the tank is 1.2 m. Assuming that all buckets are of the same measure, then the volume (in litre) of water contained by each bucket is

- (a) 12 (b) 16 (c) 18 (d) 15

Sol. (c) $\frac{2}{3}$ rd of the tank is emptied using 64 buckets.

$$\therefore \text{Volume of tank} = 64 \times \frac{3}{2} = 96 \text{ buckets of water}$$

$$\text{Now, volume of each bucket} = \frac{1.2 \times 1.2 \times 1.2 \times 1000}{96}$$

$$[\because 1\text{m}^3 = 1000 \text{ litre}]$$

$$= 18$$

14. In a farm there are cows and hens. If heads are counted there are 180, if legs are counted there are 420. The number of cows in the farm is

- (a) 150 (b) 30 (c) 130 (d) 50

Sol. (b) Let the number of cows and hens in the farm be x and y respectively.

According to the question,

$$x + y = 180 \quad \dots(i)$$

$$4x + 2y = 420 \Rightarrow 2x + y = 210 \quad \dots(ii)$$

On subtracting Eq. (ii) from Eq. (i), we get

$$-x = -30$$

$$x = 30$$

Hence, there are 30 cows in the farm.

15. If the arithmetic mean of $3a$ and $4b$ is greater than 50, and a is twice b , then the smallest possible integer value of a is

- (a) 18 (b) 19
(c) 20 (d) 21

Sol. (d) Let $b = x$

$$\therefore a = 2x$$

According to the question,

$$\frac{3a + 4b}{2} > 50$$

$$\Rightarrow 3a + 4b > 100$$

$$\Rightarrow 6x + 4x > 100$$

$$[\because a = 2x \text{ and } b = x]$$

$$\Rightarrow 10x > 100$$

$$\Rightarrow x > 10$$

$$\Rightarrow 2x > 20$$

$$\Rightarrow a > 20$$

Thus, the smallest possible integer value of a is 21.

16. If the average of eight consecutive even number be 93, then the greatest number among them is

- (a) 86 (b) 98
(c) 100 (d) 102

Sol. (c) Let the eight consecutive even numbers are

$$x, x + 2, x + 4, x + 6, x + 8, x + 10, x + 12, x + 14$$

According to the question,

$$x + x + 2 + x + 4 + x + 6$$

$$+ x + 8 + x + 10 + x + 12 + x + 14 = 93$$

$$\Rightarrow 8x + 56 = 744 \Rightarrow 8x = 744 - 56$$

$$\Rightarrow 8x = 688 \Rightarrow x = \frac{688}{8} = 86$$

Hence, the greatest number = $x + 14$

$$= 86 + 14 = 100$$

17. x can copy 80 pages in 20 h, x and y together can copy 135 pages in 27 h. Then y can copy 20 pages in

- (a) 3 h (b) 12 h (c) 20 h (d) 24 h

Sol. (c) \therefore Time taken by x to copy 80 pages = 20 h

\therefore Time taken by x to copy 20 pages

$$= \frac{20}{80} \times 20 = 5 \text{ h}$$

Similarly, time taken by x and y together to copy 20 pages

$$= \frac{27}{135} \times 20 = 4 \text{ h}$$

Now, let y can copy 20 pages in n h. Then,

$$\frac{1}{5} + \frac{1}{n} = \frac{1}{4}$$

$$\Rightarrow \frac{1}{n} = \frac{1}{4} - \frac{1}{5} = \frac{1}{20}$$

$$\Rightarrow n = 20 \text{ h}$$

18. The average of the largest and smallest 3 digit numbers formed by 0, 2 and 4 would be
 (a) 213 (b) 303 (c) 312 (d) 222

Sol. (c) According to the question,

Largest number formed = 420

Smallest number formed = 204

$$\therefore \text{Required Average} = \frac{420 + 204}{2} = \frac{624}{2} = 312$$

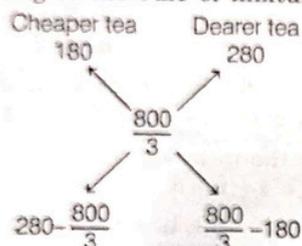
19. Two types of tea costing ₹ 180/kg and ₹ 280/kg should be mixed in the ratio so that the mixture obtained, sold at ₹ 320/kg to earn a profit of 20% is

- (a) 1 : 13 (b) 2 : 13 (c) 3 : 13 (d) 4 : 13

Sol. (b) Given, selling price of tea = ₹ 320/kg and

$$\begin{aligned} \therefore \text{Cost price of tea} &= \frac{\text{profit} = 20\%}{\text{Selling price} \times 100} \\ &= \frac{320 \times 100}{(100 + \text{profit } \%)} \\ &= \frac{320 \times 100}{120} = \frac{3200}{12} = ₹ \frac{800}{3} \end{aligned}$$

Now, according to the rule of mixture,



$$\begin{aligned} \therefore \text{Required average} &= 280 - \frac{800}{3} : \frac{800}{3} - 180 \\ &= \frac{40}{3} : \frac{260}{3} = 2 : 13 \end{aligned}$$

20. If a person marked a product 25% above the cost price but allows 10% discount, then the percentage of profit is

- (a) 15% (b) 12.5% (c) 35% (d) 17.5%

Sol. (b) Let the CP of the product = ₹ x

Then, MP of the product = 125% of x = ₹ 1.25x

And SP of the product = 90% of 1.25x = ₹ 1.125x

$$\therefore \text{Profit percentage} = \frac{1.125x - x}{x} \times 100\% = 12.5\%$$

21. Mr x and Mr y each bought the same motorcycle using a 10% off coupon. Mr x's cashier took 10% off the price and then added 8.5% sales tax, whereas Mr y's cashier first added the sales tax and then took 10% off the total price. The amount Mr x paid is

- (a) same as the amount Mr y paid
 (b) greater than ₹ 850 as the amount Mr y paid
 (c) less than ₹ 550 as the amount Mr y paid
 (d) greater than ₹ 85 as the amount Mr y paid

Sol. (a) Let CP of motorcycle = ₹ 100

\therefore Cost paid by Mr x

$$= (100 - 10\% \text{ of } 100) + 8.5\% \text{ of } (100 - 10\% \text{ of } 100)$$

$$= (100 - 10) + \{8.5\% \text{ of } (100 - 10)\}$$

$$= 90 + 7.65 = 97.65$$

Now, cost paid by Mr y

$$= (100 + 8.5\% \text{ of } 100)$$

$$- \{10\% \text{ of } (100 + 8.5\% \text{ of } 100)\}$$

$$= 108.5 - (10\% \text{ of } 108.5) = 108.5 - 10.85 = 97.65$$

So, both Mr x and Mr y paid the same amount.

22. Two workers A and B are engaged to do a piece of work A working alone would take 8 h more to complete the work than when work together. If B worked alone, would take $4\frac{1}{2}$ h more than

when work together. The time required to finish the work together is

- (a) 4 h (b) 6 h (c) 5 h (d) 8 h

Sol. (b) Let the time to finish the work together = x h

A alone will finish the work in (x + 8) h.

B alone will finish the work in (x + 45) h.

$$\therefore \frac{1}{x+8} + \frac{1}{x+45} = \frac{1}{x}$$

$$\Rightarrow \frac{x+8+x+45}{(x+8)(x+45)} = \frac{1}{x}$$

$$\Rightarrow \frac{2x+12.5}{x^2+45x+8x+36} = \frac{1}{x}$$

$$\Rightarrow 2x^2 + 12.5x = x^2 + 45x + 8x + 36$$

$$\Rightarrow 2x^2 + 12.5x = x^2 + 12.5x + 36$$

$$\Rightarrow x^2 = 36 \Rightarrow x = 6$$

\therefore Time required to finish the work together is 6 h.

Alternate Method

Here, a = 8 h, b = $4\frac{1}{2}$ h

\therefore Time required to complete the work by both of the workers together

$$= \sqrt{ab} = \sqrt{8 \times \frac{9}{2}} = \sqrt{36} = 6 \text{ h}$$

23. A and B invest in the ratio 3 : 5. After 6 months, C joins the business investing an amount equal to BS. At the end of the year what will be the ratio of their profits?

- (a) 3 : 5 : 2 (b) 3 : 5 : 5 (c) 6 : 10 : 5 (d) 8 : 10 : 5

Sol. (c) According to the question,

Ratio of profits = Ratio of investment

$$= 3 \times 12 : 5 \times 12 : 5 \times 6$$

$$= 36 : 60 : 30 = 6 : 10 : 5$$

24. If a man walks at the rate of 5 km/h, he misses a train by 7 min. However, if he walks at the rate of 6 km/h, he reaches the station 5 min before the arrival of the train. The distance covered by him to reach the station is

- (a) 6 km (b) 4 km
 (c) 7 km (d) 6.25 km

Sol. (a) Let the distance be D km.

$$\therefore \frac{D}{5} - \frac{D}{6} = \frac{12}{60} \Rightarrow \frac{6D - 5D}{30} = \frac{12}{60} \Rightarrow D = 6 \text{ km}$$

25. A dealer fixed the price of an article 40% above the cost of production. While selling it he allows a discount of 20% and makes a profit of ₹ 48. The cost of production (in ₹) of the article is

- (a) 400 (b) 360
(c) 320 (d) 420

Sol. (a) Let the cost price be ₹ x .

$$\therefore x \times \frac{140}{100} \times \frac{80}{100} - x = 48$$

$$\Rightarrow 1.12x - x = 48$$

$$\Rightarrow 0.12x = 48$$

$$\Rightarrow x = \frac{48}{0.12} = 400$$

26. Articles are marked at a price which gives a profit of 25%. After allowing a certain discount the profit reduces to $12\frac{1}{2}\%$. The discount per cent is

- (a) $12\frac{1}{2}\%$ (b) 12%
(c) 10% (d) 11.1%

Sol. (c) Let the cost price be ₹ 100.

$$\therefore \text{Marked price} = 125$$

$$\text{For a profit of } 12\frac{1}{2}\%, \text{ selling price} = 100 + \frac{25}{2} = 112.5$$

$$\therefore \text{Discount percentage} = \frac{125 - 112.5}{125} \times 100 = \frac{12.5}{125} \times 100 = 10\%$$

27. The average age of 30 students of a class is 14 yr 4 months. After admission of 5 new students in the class the average becomes 13 yr 9 months. The youngest one of the five new students is 9 yr 11 months old. The average age of the remaining 4 new students is

- (a) 13 yr 6 months (b) 12 yr 4 months
(c) 10 yr 4 months (d) 11 yr 4 months

Sol. (c) Let the average age of 4 new students be a .

$$\therefore 30\left(14\frac{1}{3}\right) + 9\frac{11}{12} + 4a = 35\left(13\frac{3}{4}\right)$$

$$\Rightarrow 30 \times \frac{43}{3} + \frac{119}{12} + 4a = 35 \times \frac{55}{4}$$

$$\Rightarrow 430 + \frac{119}{12} + 4a = \frac{1925}{4}$$

$$\Rightarrow 4a = \frac{1925}{4} - \frac{119}{12} - 430$$

$$\Rightarrow 4a = \frac{5775 - 119 - 5160}{12}$$

$$\Rightarrow 4a = \frac{496}{12}$$

$$\Rightarrow a = \frac{496}{48} = \frac{31}{3} = 10\frac{1}{3}$$

Hence, average age = $a = 10$ yr 4 months

28. A sum of money is paid back in two annual instalments of ₹ 17640 each, allowing 5% compound interest compounded annually. The sum borrowed was

- (a) ₹ 32400 (b) ₹ 32000 (c) ₹ 32200 (d) ₹ 32800

Sol. (d) Let the principal for 1st and 2nd years be P_1 and P_2 . According to the question,

$$17640 = P_1\left(1 + \frac{5}{100}\right)^1 \Rightarrow 17640 = P_1\left(1 + \frac{1}{20}\right)$$

$$\Rightarrow 17640 = P_1 \times \frac{21}{20} \Rightarrow P_1 = 840 \times 20$$

$$\Rightarrow P_1 = ₹ 16800$$

$$\text{Again, } 17640 = P_2\left(1 + \frac{5}{100}\right)^2$$

$$\Rightarrow 17640 = P_2 \times \frac{21 \times 21}{20 \times 20}$$

$$\Rightarrow P_2 = 40 \times 20 \times 20 = ₹ 16000$$

$$\therefore \text{Total sum} = P_1 + P_2 = 16800 + 16000 = ₹ 32800$$

29. There is a number consisting of two digits, the digit in the unit's place is twice that in the ten's place and if 2 is subtracted from the sum of the digits, the difference is equal to $\frac{1}{6}$ th of the

number. The number is

- (a) 26 (b) 23
(c) 25 (d) 24

Sol. (d) Let the number be $(10x + y)$.

$$\text{Given that, } y = 2x \text{ and } x + y - 2 = \frac{1}{6}(10x + y)$$

$$\Rightarrow x + 2x - 2 = \frac{1}{6}(10x + 2x) \Rightarrow 3x - 2 = 2x$$

$$\Rightarrow x = 2 \text{ and } y = 4$$

$$\therefore \text{Number} = 10 \times 2 + 4 = 24$$

30. Average of n numbers is a . The first number is increased by 2, second one is increased by 4, the third one is increased by one is increased by 8 and so on. The average of the new number is

- (a) $a + \frac{2^n - 1}{n}$ (b) $a + 2\frac{2^n - 1}{n}$
(c) $a + \frac{2^n - 1}{n}$ (d) $a + \frac{2^n - 1}{n}$

$$\text{Sol. (b) New average} = \frac{na + 2 + 4 + 8 + 16 + \dots + 2^n}{n}$$

$$= \frac{na + 2\left(\frac{2^n - 1}{2 - 1}\right)}{n} = a + 2\frac{2^n - 1}{n}$$

Directions (Q. Nos. 31-34) In each of the following questions, out of the given alternatives, choose the one which best expresses the meaning of the given word.

31. ENDORSEMENT

- (a) Reprimand (b) Censure
(c) Commendation (d) Reproach

Sol. (c) 'Endorsement' means an expression of formal support or approval for someone or something. Hence, 'Commendation' best expresses its meaning.

32. COMMEMORATE

- (a) Boast (b) Remember
(c) Manipulate (d) Harmonise

Sol. (b) 'Commemorate' means to show that you remember an important person or event by having a special ceremony, or by creating a special object. Hence, 'Remember' is nearest in meaning to it.

33. WHIM

- (a) Fancy (b) Clumsy
(c) Desire (d) Strange behaviour

Sol. (c) 'Whim' means sudden wish or idea, especially one that cannot be reasonably explained. Hence, 'Desire' is nearest in meaning to it.

34. CANDID

- (a) Rude (b) Impertinent
(c) Blunt (d) Frank

Sol. (d) 'Candid' means telling the truth, even when the truth may be unpleasant or embarrassing. Hence, 'Frank' is nearest in meaning to it.

Directions (Q. Nos. 35-38) In each of the following questions, a word has been written in four different ways out of which only one is correctly spelt. Find the correctly spelt word.

35. (a) Mountaineous (b) Mountaneous
(c) Mountainous (d) Mountanous

Sol. (c) Option (c) gives the correct spelling of Mountainous.

36. (a) Hindrence (b) Hindrance
(c) Hinderence (d) Hinderance

Sol. (b) Option (b) gives the correct spelling of Hindrance.

37. (a) Sacrosanct (b) Sacrosenct
(c) Secrosanct (d) Sacrosantt

Sol. (a) Option (a) gives the correct spelling of Sacrosanct.

38. (a) Palid (b) Pallid (c) Palled (d) Pellid

Sol. (b) Option (b) gives the correct spelling of Pallid.

Directions (Q. Nos. 39-42) In each of the questions below four sentences are given which are denoted by (A), (B), (C), (D). By using all the four sentences you have to frame a meaningful para. The correct order of the sentences is your answer. Choose from the four alternatives the one having the correct order of sentences and mark it as your answer.

39. (A) Now under liberated economy they are learning to compete domestically and globally.
(B) In India corporations until recently achieved success by avoiding competition, using protected and regulated domestic markets.
(C) The trend is irreversible.

(D) Business leaders are preparing themselves to meet competitive challenges, and to avoid being swept away.

- (a) BADC (b) BDCA (c) BDAC (d) CDBA

Sol. (a) The correct order of the given sentences is BADC.

40. (A) Recovery was given inadequate attention and consequently some bank branches regularly incurred heavy losses and their parent bodies had to bale them out.

(B) As a result, banks indulged in extensive lending to borrowers who had little or no potential to make repayments.

(C) To fulfil the social objectives laid down by the masters of nationalisation, banks were asked to lend to identified priority sectors.

(D) 1992-93 results showed that the loss making branches of public sector banks increased from 10,000 to 13,000 and the quantum of losses showed at ₹ 3,369 crores.

- (a) BACD (b) DABC (c) CBAD (d) BCAD

Sol. (c) The correct order of the given sentences is CBAD.

41. (A) Finally the bureaucratic organisation took over from the pioneering enterprise.

(B) The nineteenth century was the age of entrepreneur, the self-made man.

(C) Thoughtful business administration took over from action centred business entrepreneurship.

(D) In the twentieth century the rational executive took command.

- (a) DBAC (b) CABD (c) BDCA (d) BCDA

Sol. (c) The correct order of the given sentences is BDCA.

42. (A) He was so busy with them that he did not get time to eat.

(B) Thousands of people came to him and asked different types of questions.

(C) No one cared to see that he had his food or rest that night

(D) Swami Vivekanand once stayed in a small village

- (a) BCDA (b) CBAD (c) DBAC (d) DBCA

Sol. (c) The correct order of the given sentences is DBAC.

Directions (Q. Nos. 43-47) Each item in this section consists of sentences with an underlined word followed by four words or group of words. Select the option that is opposite in meaning to the underlined word and mark your response on the Answer Sheet accordingly.

43. He speaks eloquently and can pull crowds.

- (a) confusingly (b) expressively
(c) powerfully (d) fluently

Sol. (a) 'Eloquently' means in a way that gives a strong, clear message. Hence, 'confusingly' is opposite in meaning to it.

44. Everyone has to fight the inertia in the system.

- (a) sluggishness (b) indolence
(c) inactivity (d) torpor

Sol. (c) 'Inertia' means 'inactivity'. So, option (c) is opposite in meaning to it.

45. There is a need to promote philanthropy in education.

- (a) charity (b) benevolence
(c) nastiness (d) likeliness

Sol. (c) 'Philanthropy' means the activity of helping the poor, especially by giving them money. Hence, 'nastiness' is opposite in meaning to it.

46. What we lack in the current times is compassion.

- (a) empathy (b) carefulness
(c) indifference (d) hardship

Sol. (c) 'Compassion' is a strong feeling for someone who is suffering, and a desire to help them. So, 'indifference' is opposite in meaning to it.

47. Tempestuous behaviour would not yield much in any place.

- (a) relaxed (b) passionate
(c) intense (d) windy

Sol. (a) 'Tempestuous' means full of strong emotion. Hence, 'relaxed' is opposite in meaning to it.

Directions (Q. Nos. 48-52) Each of the following sentences in this section has a blank space and four words or group of words given after the sentence. Select the word or group of words you consider most appropriate for the blank space and indicate your response on the Answer Sheet accordingly.

48. The Election Commission on Saturday that the Assembly elections in five States will be held from 12th November to 7th December.

- (a) pronounced
(b) announced
(c) promulgated
(d) issued

Sol. (b) 'announced' is suitable to fill the blank as it fits the context of the sentence.

49. The victims were fruit vendors and they were going in an auto when they an accident on the way.

- (a) met with (b) ran into
(c) experienced (d) heard

Sol. (a) 'met with' means to experience something, usually something unpleasant. Hence, 'met with' fits the blank properly.

50. Scores of villagers are a sit-in protest against the construction of a new underpass.

- (a) performing (b) sitting
(c) staging (d) standing

Sol. (c) 'Staging' is the appropriate word that goes with 'protest'.

51. It is common for patients to stop medicine as soon as they start feeling better.

- (a) eating (b) gulping
(c) swallowing (d) taking

Sol. (d) 'taking' is suitable to fill the blank as per the context of the sentence.

52. A four-year-old girl got a new lease of life after doctors at a hospital a cancerous tumour from one of her kidneys.

- (a) rejuvenated (b) removed
(c) displaced (d) replaced

Sol. (b) 'removed' is the word that goes with 'tumour'. Hence, it fits in the blank appropriately.

Directions (Q. Nos. 53-55) Choose the correct plural form of the given words.

53. Loaf

- (a) Loaves (b) Loafs (c) Loavs (d) Lofes

Sol. (a) 'Loaves' is the plural of 'Loaf'.

54. Spy

- (a) Spis (b) Spys (c) Spies (d) Spiess

Sol. (c) The plural of 'Spy' is 'Spies'.

55. Vertex

- (a) Vertics (b) Vertexs (c) Verticess (d) Vertices

Sol. (d) The plural of 'Vertex' is 'Vertices'.

Directions (Q. Nos. 56-75) Read the following passages and answer the questions that follow.

PASSAGE 1

Indian nationalism emanated from 'traditional patriotism', a socially active sentiment of attachment to land, language and cult, that developed in the subcontinent long before the process of westernisation had begun. In India of the 18th and early 19th centuries, such sentiments were emerging on a regional basis as homeland was being defined by various terms like desh, vatan or nadu. But although regionally centred at Bengal, Maharashtra, Awadh or Mysore, their isolation broke down through various means of communication, the political legitimacy of the Mughal empire was recognised throughout Hindustan, which was thought to be the abode of both. The Hindus and the Muslims; and cultural barriers melted down through commercialisation and regular pilgrimages. It burst forth through numerous acts of resistance; participated by both princes and the commoners, culminating in the Revolt of 1857. After the revolt, a modern sector of politics gradually evolved in India, through rapid spread of education, development of communication systems, such as the railways and telegraph and the emergence of a new public space created by the colonial institutions.

56. Which of the following was the result of the East India Company's rule in India?

- (a) Good government
- (b) Consolidation of patriotic sentiments
- (c) New ethical tradition
- (d) Evangelicalism

Sol. (b) Consolidation of patriotic sentiments was the result of the East India company's rule in India.

57. Which of the following contributed most to the dissolution of cultural barriers?

- (a) Pilgrimage
- (b) Creation of Mughal empire
- (c) Commercialisation
- (d) Communication networks

Sol. (c) Commercialisation contributed most to the dissolution of cultural barriers.

58. In pre-colonial India, what did the nationalism mean?

- (a) Cultural construction of homeland
- (b) Linguistic affinity
- (c) Patriotism
- (d) Social activism

Sol. (d) In pre-colonial India, the nationalism mean social activism.

PASSAGE 2

Anxiety and conscience are a pair of powerful dynamos. Of course, I can only speak for myself between them, they have ensured that one shall work at anything worthwhile. They are blind forces which drive but do not direct. Fortunately, I have also been moved by a third motive—the wish to see and understand. Curiosity is another motive for action. It is also one of the distinctive characteristics of human nature and contrasted with the natures of non-human animals.

All human beings have curiosity in some degree and we also have it about things which are of no practical use. Curiosity may be focused on anything in the universe, but the spiritual reality of the phenomenon should be the ultimate objective of all curiosity for it to be fruitful. Thanks to my mother, my approach to this ultimate objective is through the story of human affairs.

59. What is the main objective of this passage?

- (a) Distinguish between human beings and animals
- (b) Project curiosity as a potent motivating factor
- (c) Project anxiety and conscience as inadequate motivators
- (d) Motivation and spiritual reality

Sol. (b) The main objective of the given passage is project curiosity as a potent motivating factor.

60. A characteristic, peculiar to human beings that is referred to is

- (a) superior intelligence
- (b) spirit of enquiry
- (c) capacity to rationalise and analyse
- (d) ability to shift the practical from the impractical

Sol. (b) A characteristic, peculiar to human beings that is referred to, is spirit of enquiry.

61. Which of the following statements is true according to the passage?

- (a) Animals are as curious as human beings
- (b) Curiosity is the only motive for action
- (c) People motivated by curiosity do not need other motives to guide them
- (d) People motivated by anxiety and conscience alone can be misdirected

Sol. (d) According to the passage, it is true that people motivated by anxiety and conscience alone can be misdirected.

62. According to the author

- (a) those who have little curiosity are curious about unimportant things
- (b) apart from humans no other living beings have the gift of curiosity
- (c) the highest form of the curiosity can be satisfied by study of human affairs alone
- (d) spiritual reality is the ultimate goal of humans through action

Sol. (d) According to the author, spiritual reality is the ultimate goal of humans through action.

63. The author subscribes to the view that

- (a) one's curiosity should focus beyond the facade on the latent meaning of things
- (b) curiosity is an inherited family characteristic
- (c) a study of human affairs is the most effective method of satisfying one's curiosity
- (d) in order to motivate, curiosity must be coupled with anxiety and conscience

Sol. (a) The author subscribes to the view that one's curiosity should focus beyond the facade on the latent meaning of things.

PASSAGE 3

One simple physical concept lies behind the formation of the stars gravitational instability. The concept is not new. Newton first perceived it late in the 17th century. Imagine a uniform, static cloud of gas in space.

Imagine then that the gas is somehow disturbed so that one small spherical region becomes a little denser than the gas around it so that the small region's gravitational field becomes slightly stronger.

It now attracts more matter to it and its gravity increases further, causing it to begin to contract. As it contracts, its density increases, which increases its gravity even more, so that it picks up even more matter and contracts even further. The process continues, until the small regions of gas finally form a gravitationally bound object.

64. The primary purpose of the passage is to
- (a) describe a static condition
 - (b) support a theory considered outmoded
 - (c) depict the successive stages of a phenomenon
 - (d) demonstrate the evolution of the meaning of a term

Sol. (c) The primary purpose of the passage is to depict the successive stages of a phenomenon.

65. It can be inferred from this passage that the author views the information contained within it as

- (a) lacking in elaboration
- (b) original but obscure
- (c) speculative and unprofitable
- (d) uncomplicated and traditional

Sol. (d) It can be inferred from the given passage that the author views the information contained within it as complicated and traditional.

66. With which of the following words can you replace the word 'uniform' as given in this passage?

- (a) Uniting
- (b) Varying
- (c) Gaseous
- (d) Unvarying

Sol. (d) The word 'unvarying' can replace the word 'uniform' as given in the passage. Unvarying means not changing; constant or uniform.

67. What does the word 'it' in bold type stand for in the passage?

- (a) Gravitational instability
- (b) Cloud of gas
- (c) Small spherical denser region
- (d) Matter

Sol. (c) In the passage, the bold word 'it' stands for small spherical denser region.

68. The author provides information that answers, which of the following questions?

- (i) What causes the disturbances that change the cloud from its original static condition?
- (ii) How does this small region's increasing density affect its gravitational field?

- (iii) What is the end result of the gradually increasing concentration of the small region of gas?

Which of the above statement(s) given above is/are correct?

- (a) Only (i)
- (b) Only (ii)
- (c) (ii) and (iii)
- (d) All of the above

Sol. (c) The author provides information that answers the given (ii) and (iii) questions.

PASSAGE 4

As heart disease continues to be the number one killer in the United States, researchers have become increasingly interested in identifying the potential risk factors that trigger heart attacks. High fat-diets and life in the fast lane have long been known to contribute to the high incidence of heart failure. But according to new studies, the list of risk factors may be significantly longer and quite surprising. Heart failure, e.g., appears to have seasonal and temporal patterns. A higher percentage of heart attacks occurs in cold weather and more people experience heart failure on Monday than on any other day of the week.

In addition, people are more susceptible to heart attacks in the first few hours after waking. Cardiologists first observed this morning phenomenon in the mid 1980 and have since discovered a number of possible causes. An early morning rise in blood pressure, heart rate and concentration of heart stimulating hormones, plus a reduction of blood flow to the heart, may all contribute to the higher incidence of heart attacks between the hours of 8:00 am and 10:00 am. In other studies, both birthday and bachelorhood have been implicated as risk factors.

Statistics reveal that heart attack rate increases significantly for both females and males in the few days immediately preceding and following their birthdays. And unmarried men are more at risk for heart attacks than their married counterparts. Though, stress is thought to be linked in some way to all of the aforementioned risk factors, intense research continues in the hope of future comprehending, why and how heart failure is triggered.

69. What does the passage mainly discuss?

- (a) Cardiology
- (b) Diet and stress as factors in heart attacks
- (c) Seasonal and temporal patterns of heart attacks
- (d) Risk factors in heart attacks

Sol. (c) The given passage mainly discusses seasonal and temporal patterns of heart attacks.

70. The word 'potential' could best be replaced by which of the following?

- (a) Harmful (b) Possible
(c) Unknown (d) Primary

Sol. (b) The word 'potential' could best be replaced by the word possible.

71. According to the passage, which of the following is not a possible cause of many heart attacks?

- (a) Decreased blood flow to the heart
(b) Increased blood pressure
(c) Lower heart rate
(d) Increase in hormones

Sol. (c) According to the passage, lower heart rate is not a possible cause of many heart attacks.

72. Which of the following is cited as a possible risk factor?

- (a) Getting married (b) Rainy weather
(c) Eating fatty foods (d) Driving fast

Sol. (c) Eating fatty foods is cited as a possible risk factor.

73. Which of the following does the passage infer?

- (a) We now fully understand how the risk factors trigger heart attacks
(b) We do not fully understand how the risk factors trigger heart attacks
(c) We have not identified risk factors associated with heart attacks
(d) We have recently begun to study how risk factors work

Sol. (b) The passage infer that we do not fully understand how the risk factors trigger heart attacks.

74. What could be the suitable title of the passage?

- (a) Heart disease in the USA
(b) Causes of Heart Attack
(c) Stress
(d) Risk of Heart attack in Humans

Sol. (b) The suitable title for the passage could be 'causes of Heart Attack' as the whole passage is given about the Heart and Heart related problems.

75. Which word can be the most opposite word of 'unlikely'?

- (a) Susceptible (b) Stimulating
(c) Implicated (d) Aforementioned

Sol. (a) The word 'Susceptible can be the most opposite word of 'unlikely'.

Susceptible means likely to be influenced or affected by, that is probably going to be the case.

Unlikely means not likely to happen or not expected.

Directions (Q.Nos. 76-80) Study the following information carefully and answer the given questions:

Eight friends, P, Q, R, S, T, V, W and Y are sitting around a square table in such a way that four of them sit at four

corners of the square while four sit in the middle of each of the four sides. The ones who sit at the four corners face the centre while those who sit in the middle of the sides face outside.

P, who faces the centre, sits third to the right of V. T, who faces the centre, is not an immediate neighbour of V. Only one person sits between V and W. S sits second to right of Q. Q faces the centre. R is not an immediate neighbour of P.

76. Who sits second to the left of Q?

- (a) V (b) P
(c) T (d) Y

77. What is the position of T with respect to V?

- (a) Fourth to the left
(b) Second to the left
(c) Third to the left
(d) Third to the right

78. Three of the following four are alike in a certain way and so form a group. Which is the one that does not belong to that group?

- (a) R (b) W
(c) V (d) S

79. Which of the following will come in place of the question mark(?) based upon the given seating arrangement?

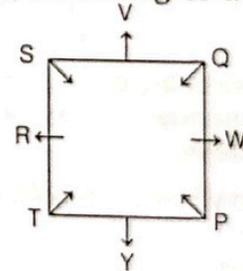
WP TR QW RS ?

- (a) YT (b) VY (c) VQ (d) PY

80. Which of the following is true regarding R?

- (a) R is an immediate neighbour of V
(b) R faces the centre
(c) R sits exactly between T and S
(d) Q sits third to left of R

Sol. (Q.Nos. 76-80) According to the question,

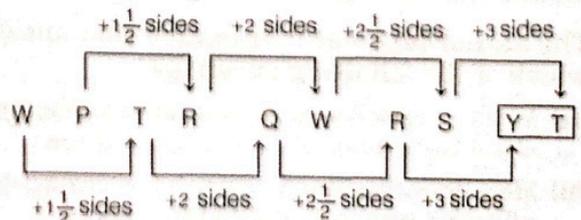


76. (b) P sits second to the left of Q.

77. (c) T is third to the left of V.

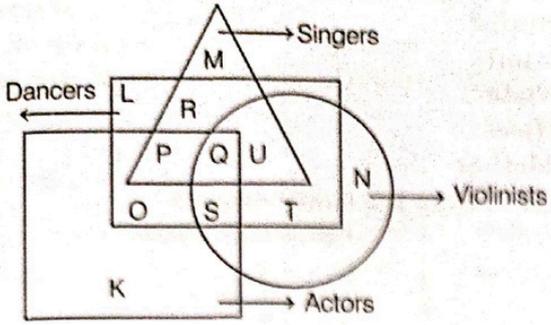
78. (d) Except all others sit in the middle of the sides.

79. (a) Move $1\frac{1}{2}$, 2, $2\frac{1}{2}$, 3 ... sides clockwise on the square.



80. (c) Option (c) is the correct answer.

81. In the given figure, which letter represents those Actors who are also Dancers, Singers as well as Violinists?

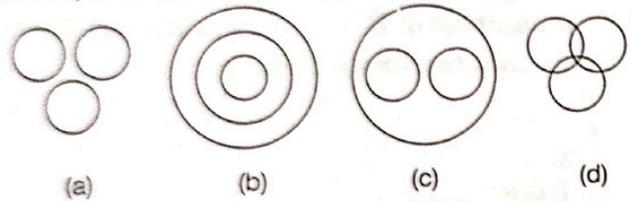


- (a) S
- (b) Q
- (c) P
- (d) U

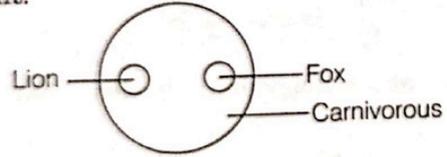
Sol. (b) From figure, rectangle, small rectangle, triangle and circle represent Actors, dancers, singers and violinists, respectively. It is evident that only Q falls in all the above four figures.

Directions (Q. Nos. 82 and 83) In the following questions, which one of the following diagram represents the correct relationship among :

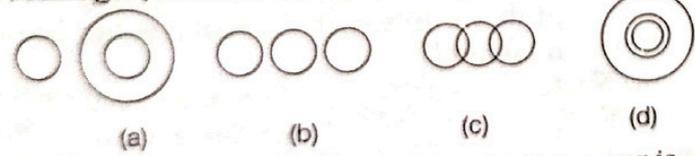
82. Lion, Fox and Carnivorous



Sol. (c) Lion and fox both are carnivorous but both are different.



83. Manager, Labour Union and Worker



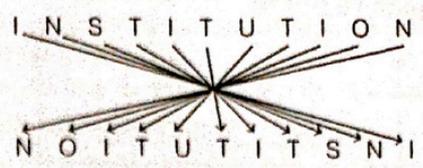
Sol. (a) Workers are part of labour union, but manager is different.



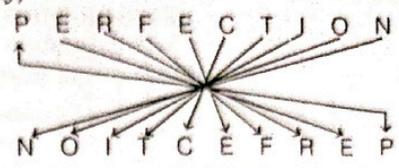
84. In a certain code language 'INSTITUTION' is written as 'NOITUTITSNI'. How will 'PERFECTION' is written in that language?

- (a) NOICTEFREP
- (b) NOITCEFERP
- (c) NOITCEFRPE
- (d) NOITCEFREP

Sol. (d) As,



Similarly,

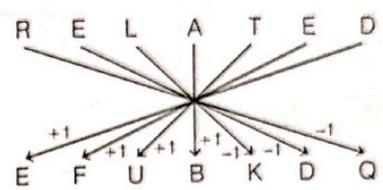


∴ PERFECTON ⇒ NOITCEFERP

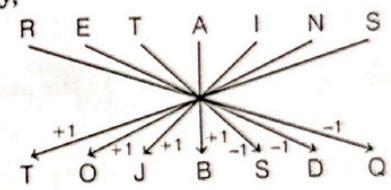
85. In a certain code language 'RELATED' is written as 'EFUBKDQ', then how will 'RETAINS' be written in that language?

- (a) SDQBTOJ
- (b) JOTBQDS
- (c) JOTBSDQ
- (d) TOJBSDQ

Sol. (d) As,



Similarly,



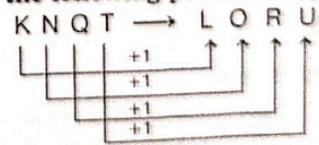
∴ RETAINS ⇒ TOJBSDQ

Directions (Q. Nos. 86-89) In these questions, select the related letters from the given alternatives.

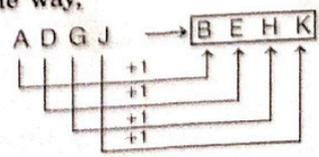
86. KNQT : LORU :: ADGJ : ?

- (a) BEHK
- (b) FHLO
- (c) DGEF
- (d) MPVW

Sol. (a) We have the following pattern for given letters



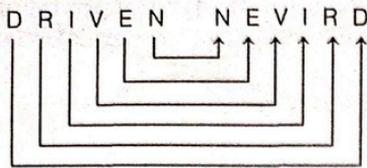
In the same way,



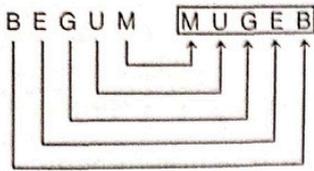
87. DRIVEN : NEVIRD :: BEGUM : ?

- (a) MEUBG
- (b) BGMUE
- (c) EBGMU
- (d) MUGEB

Sol. (d) The pattern will be



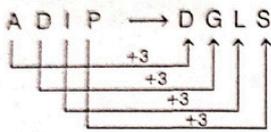
In the same way,



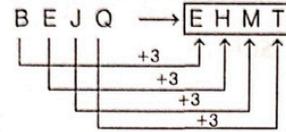
88. ADIP : DGLS :: BEJQ : ?

- (a) EHMT (b) EJQU
(c) CGLS (d) FINU

Sol. (a) The pattern will be



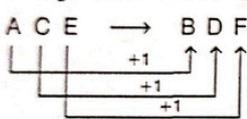
In the same way,



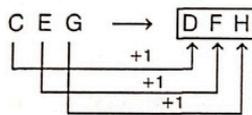
89. ACE : BDF :: CEG : ?

- (a) DEF (b) DFH
(c) DEH (d) DFE

Sol. (b) The pattern will be



In the same way,

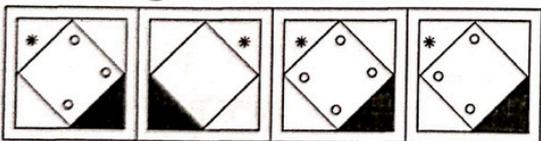


Direction (Q.No. 90) A series is given with one term missing. Choose the correct alternative from the given ones that will complete the series.

90. Question Figures



Answer Figures



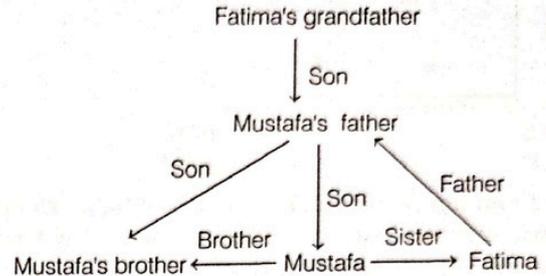
- (a) (b) (c) (d)

Sol. (c) In the given question figures, the star is moving one step in clockwise direction, shaded triangle shifts one step in clockwise direction and one black circle is added in each subsequent figure.

91. Fatima while introducing Mustafa to her husband said, "His brother's father is the only son of my grandfather". How is Fatima related to Mustafa?

- (a) Aunt
(b) Sister
(c) Niece
(d) Mother

Sol. (b) Let us draw the family diagram

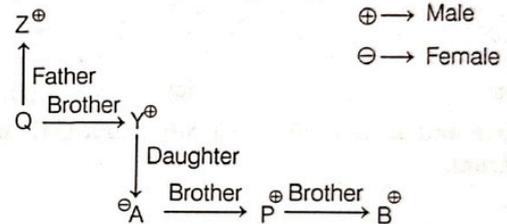


So, it is clear that Fatima is the sister of Mustafa.

92. A, Q, Y and Z are different persons. Z is the father of Q. A is the daughter of Y and Y is the son of Z. If P is the son of Y and B is the brother of P, then

- (a) B and Y are brothers (b) A is the sister of B
(c) Z is the uncle of B (d) Q and Y are brothers

Sol. (b) Let us draw the family diagram

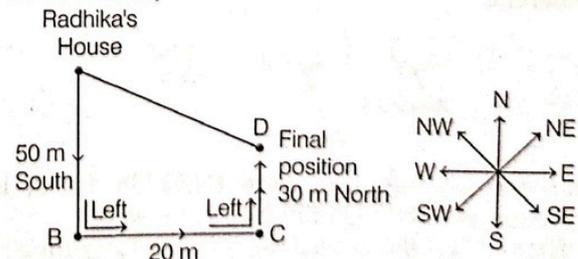


From the above diagram, it is clear that A is the sister of B.

93. Radhika went 50 m South from her house, then turned left and went 20 m, then turning to North she went 30 m. In which direction is her home from this point?

- (a) North (b) South-West
(c) East (d) North-West

Sol. (d) According to the question, the direction diagram will be as follows,

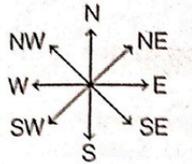


Clearly, Radhika's house is towards North-West from the final position D.

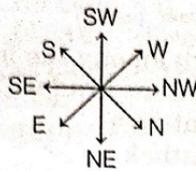
94. If South-East becomes North and North-East becomes West and all the rest directions are changed in the same manner, what will be the direction for the West?

- (a) North-East (b) South
(c) South-East (d) South-West

Sol. (c)



Original directions



After changing directions

Now, from the above diagrams, it is clear that South-East will be the direction for West.

Directions (Q.Nos. 95-97) In the following questions a statement is given, you have to assume everything to be true, then decide which of the suggested courses of action logically follow(s) for pursuing.

Give Answer

- (a) If only course of action I follows
(b) If only course of action II follows
(c) If either course of action I or II follows
(d) If both courses of action I and II follow

95. **Statement** Many pilgrims died in a stampede while boarding a private ferry to the holy place on the first day of the ten-day-long festival.

Courses of action

- I. The Government should immediately cancel the licences of all the private ferry operators with immediate effect.
II. The Government should deploy an adequate number of its personnel to guide pilgrims on their journey to the holy place.

Sol. (b) I is an insensible action. But II will be helpful in preventing such accidents.

96. **Statement** Some students of the local college were caught travelling in the train without purchasing valid tickets.

Courses of action

- I. The parents of these students should be informed about the incident and requested to counsel their wards.
II. These students should be put behind bars for travelling without bona fide credentials.

Sol. (a) We should remember that the culprits are mere students. Going for II instead of I would make sense only if it is a repeated act.

97. **Statement** A large part of the locality was flooded as the main pipe supplying drinking water burst while the workers of a utility company were laying cables in the area.

Courses of action

- I. The civic authority should immediately arrange to repair the damage and stop loss of water.
II. The civic authority should seek an explanation and compensation from the utility company for the damage caused by them.

Sol. (d) I is advisable in the short term and II in the long term.

Directions (Q. Nos. 98 and 99) In each of the following questions, two statements are given followed by two Conclusions I and II. You have to consider the two statements to be true even if they seem to be at variance from commonly known facts. You have to decide which of the given conclusions, if any follow from the given statements.

98. **Statements**

- I. Education is a process of lighting.
II. Mind requires light to enlighten the core of cognitive aspect.

Conclusions

- I. Education is a light which removes the darkness of mind.
II. Education is a static process for mind.
(a) Only Conclusion I follows
(b) Only Conclusion II follows
(c) Both Conclusions I and II follow
(d) Neither Conclusion I nor II follows

Sol. (a) Clearly, I follows directly from the given statement. However, II is slightly different to the given statements and so does not follow.

99. **Statements**

- I. Best performance in Olympics fetches a gold medal.
II. Player 'X' got gold medal but later was found to be using a prohibited drug.

Conclusions

- I. 'X' should be allowed to keep the gold medal.
II. Gold medal should be withdrawn and given to the next person.
(a) Only Conclusion II follows
(b) Neither Conclusion I nor II follows
(c) Both Conclusions I and II follow
(d) Only Conclusion I follows

Sol. (a) If a player is found guilty of doping, his medal is confiscated. Therefore, only Conclusion II follows.

100. In this question, two statements are given followed by some conclusions. You have to decide which of the given conclusions follow from the given statements.

Statements

- I. There are monks among those who are felicitated for remarkable social service.
- II. Jitananda and Vidyananda are among those felicitated.

Conclusions

- (a) Jitananda and Vidyananda did remarkable social service
- (b) All monks do social service
- (c) Jitananda and Vidyananda are not monks
- (d) All monks are felicitated

Sol. (a) From both the statements, it is clear that Conclusion given in option (a) is true.

101. The tagline 'The Complete Man' is associated with which of the following fashion brand?

- (a) Siyaram
- (b) Raymond
- (c) Zara
- (d) Allen Solly

Sol. (b) 'Raymond owns the tagline 'The Complete Man'. Raymond is an Indian branded fabric and fashion retailer established in 1925 in Mumbai. Raymond group also owns apparel brands like Park Avenue, Colour Plus, Parx etc.

102. Who is the current CEO of Indian fashion e-commerce company Myntra?

- (a) Amar Nagaram
- (b) Ananth Narayanan
- (c) Vineet Saxena
- (d) Mukesh Bansal

Sol. (a) Myntra is an Indian fashion e-commerce company headquartered in Bengaluru, Karnataka in 2007. It was founded by Mukesh Bansal, Vineet Saxena and Ashutosh Lawania. The present CEO of Myntra is Amar Nagaram.

103. Which of the following retail stores belongs to Aditya Birla Group?

- (a) Big Bazar
- (b) Croma
- (c) Hypercity
- (d) Pantaloons

Sol. (d) Pantaloons Fashion and Retail Limited is an Indian clothing retail store chain owned by the Aditya Birla group. It deals in apparel and accessories for men, women and children.

104. RADO, the famous international wrist watch range belongs to

- (a) Switzerland
- (b) Spain
- (c) Japan
- (d) France

Sol. (a) Rado is a swiss luxury watchmaking company founded in 1917. It is headquartered in Lengnau, Switzerland. The brand is owned by the Swatch group and is famous brand in India and South-East Asia.

105. Which Indian film actress is the brand ambassador of online portal 'Make My Trip'?

- (a) Priyanaka Chopra
- (b) Shraddha Kapoor
- (c) Alia Bhatt
- (d) Deepika Padukone

Sol. (c) Make My Trip is an Indian online travel company founded in 2000 by Deep Kalra. The current brand ambassadors of Make My Trip includes Alia Bhatt and Ranveer Singh.

106. Which among the following dance forms belongs to Andhra Pradesh?

- (a) Sattriya
- (b) Bharatnatyam
- (c) Kathak
- (d) Kuchipudi

Sol. (d) Kuchipudi is one of the eleven major classical Indian dances that belongs to the state of Andhra Pradesh. It is a dance drama performance having its roots in the Ancient Hindu text of Natya Shastra.

107. Which among the following is an Indian Brand?

- (a) Chanel
- (b) Zara
- (c) Gucci
- (d) Allen Solly

Sol. (d) Allen Solly is an Indian clothing retail brand owned by Aditya Birla Fashion and Retail Ltd. Chanel is a French privately owned company, Gucci is an Italian Luxury brand and Zara is a Spanish apparel retailer.

108. Who is the first female Chief Economist of International Monetary Fund (IMF)?

- (a) Kristalina Georgieva
- (b) Anshula Kant
- (c) Gita Gopinath
- (d) Rohini Pande

Sol. (c) Gita Gopinath is an Indian American economist appointed as the first Woman Chief Economist of the International Monetary Fund. She was appointed at the top post on 1st October, 2019.

109. Which state is known for its renowned Maheshwari and Chanderi Sarees?

- (a) Karnataka
- (b) Madhya Pradesh
- (c) Tamil Nadu
- (d) Rajasthan

Sol. (b) Chanderi and Maheshwari sarees belong to the state of Madhya Pradesh. The Chanderi saree is made from pure silk, chanderi cotton and silk cotton. The Maheshwari saree is a cotton and pure silk saree.

110. Which of these cities is a World Heritage city by declared by UNESCO?

- (a) Ahmedabad
- (b) Delhi
- (c) Chennai
- (d) Hyderabad

Sol. (a) The historic city of Ahmedabad, founded by Ahmad Shah I in 1411 was named as a World Heritage city by UNESCO in 2017. It was the world's first heritage city inscribed by UNESCO.

111. In which state is the Manas National Park located?

- (a) Assam
- (b) Rajasthan
- (c) Meghalaya
- (d) Manipur

- Sol.** (a) The Manas National Park or Manas Wildlife Sanctuary is located in the state of Assam. The park is known for its rare and endangered endemic wildlife such as Assam Roofed Turtle, Hispid Hare, Pygmy hog etc.
- 112.** Baggit is a well known brand which sells
 (a) bags (b) belts
 (c) wallets (d) All of these
- Sol.** (d) Baggit is an Indian apparel brand that deals in bags, belts, wallets, card cases etc. The brand strongly believes in 'beauty without cruelty' which made it win the PETA Proggy Award.
- 113.** Who became the first ever Indian to win a gold at Badminton World Championship?
 (a) PV Sindhu (b) Saina Nehwal
 (c) P Kashyap (d) Jwala Gutta
- Sol.** (a) Pusarla Venkata Sindhu is a professional badminton player, who became the first Indian to win a Gold at the World Badminton Championships. She defeated her rival Nozomi Okuhara of Japan to win the Gold.
- 114.** Where is Louis Vuitton headquarters located?
 (a) London (b) Milan
 (c) Paris (d) New York
- Sol.** (c) Louis Vuitton is a French fashion house and luxury retail company established in 1854 by the designer Louis Vuitton. Its headquarters is located in Paris.
- 115.** Which is the world's biggest retailer brand?
 (a) Target (b) Walmart
 (c) JC Penny (d) Amazon
- Sol.** (b) Walmart is an American Multinational retail corporation that operates a chain of hypermarkets, grocery stores, department stores etc. It was founded in 1962 and is currently the largest retail brand in the world having almost 11,438 stores worldwide.
- 116.** Which of the following desert is located in China?
 (a) Thar desert (b) Atacama desert
 (c) Kalahari desert (d) Gobi desert
- Sol.** (d) Gobi desert is located in parts of Northern and North-Eastern China and Southern part of Mongolia. Kalahari desert is located in Southern part of Africa, Atacama desert is located in South America and Thar desert is located in India.
- 117.** In which year was the Lakme Fashion Week first started?
 (a) 2006 (b) 2008 (c) 2000 (d) 1999
- Sol.** (d) The Lakme fashion week is a bi-annual fashion event that takes place in Mumbai. It was started in the year 1999 and is organised by Lakme and IMG Reliance Limited.
- 118.** Which Constitutional Amendment Act gave Constitutional Status to Panchayati Raj Institutions?
 (a) 73rd (b) 74th (c) 93rd (d) 94th
- Sol.** (a) The Panchayati Raj Institutions were incorporated in the Constitution of India through the 73rd Constitutional Amendment Act, 1992. The basic unit of Panchayati Raj is the Gram Sabha.
- 119.** Which of the following is not a member of the Shanghai Cooperation Organisation?
 (a) India (b) China (c) Japan (d) Russia
- Sol.** (c) The Shanghai cooperation organisation is a political, economic, security alliance established in 2001. Its members include China, Kazakhstan, Kyrgyzstan, Russia, Tajikistan, Uzbekistan, India and Pakistan.
- 120.** Retail venture 'Big Bazar' is owned by
 (a) Future Group (b) Bharti Group
 (c) Sriram Group (d) Rahja Group
- Sol.** (a) Big Bazar is an Indian retail chain of hypermarkets, department stores and grocery stores. It operates under the future group. It was founded by Kishore Biyani.
- 121.** Which of these river is a tributary of Ganga?
 (a) Son (b) Narmada
 (c) Godavari (d) Mahi
- Sol.** (a) The Son river is the second largest tributary of Ganga, after the Yamuna. It originates at the Amarkantak plateau and flows North and North-westwards, meeting Ganga at Sonbhadra in Uttar Pradesh.
- 122.** Which Indian American economist was awarded the Nobel Prize of Economics in 2019?
 (a) Kaushik Basu (b) Raghuram Rajan
 (c) Abhijeet Banerjee (d) Urjit Patel
- Sol.** (c) The Nobel Memorial Prize in economic sciences was won by Abhijeet Banerjee, along with Esther Duflo and Michael Kremer. They were awarded this prize for 'their experimental approach to alleviating global poverty'.
- 123.** Who among the following is not an Indian fashion designer?
 (a) Manish Malhotra (b) Rohit Bal
 (c) Ritu Kumar (d) Bibi Russell
- Sol.** (d) Bibi Russell is a Bangladeshi Fashion designer born in Chittagong, Bangladesh. She is widely credited for raising the status of the gamchha (cotton towel) to the domain of fashionable clothing.
- 124.** Which city is known as the 'Manchester of South India'?
 (a) Cochin (b) Coimbatore
 (c) Calicut (d) Chennai
- Sol.** (b) Coimbatore is known as the Manchester of South India due to its extensive textile industries. It houses a large number of small, medium and large textile mills and a number of textile research institutes.
- 125.** Little black dress was introduced by
 (a) Zara (b) Gucci
 (c) Prada (d) Coco Chanel

Sol. (d) Little black dress is a black evening dress introduced in the 1920s by Coco Chanel and Jean Patou. A picture of the black dress was published in American Magazine Vogue by Coco Chanel in 1926.

Directions (Q.Nos. 126-139) Read each case very carefully and answer the questions that follow.

CASE 1

The Chinese krait and the Chinese cobra might be the original source of the newly discovered coronavirus that has triggered an outbreak of a deadly infectious respiratory illness in China in winter 2019. The many-banded krait (*Bungarus multicinctus*), also known as the Taiwanese krait or the Chinese krait, is a highly venomous species of elapid snake found in much of Central and Southern China and South-East Asia.

The illness was first reported in late December 2019 in Wuhan, a major city in central China and has been rapidly spreading. Since then, sick travelers from Wuhan have infected people in China and other countries, including the United States, India, Japan, Australia, Singapore, Hong Kong.

Using samples of the virus isolated from patients, scientists in China have determined the genetic code of the virus and used microscopes to photograph it. The pathogen responsible for this pandemic is a new coronavirus. It's in the same family of viruses as the well-known Severe Acute Respiratory Syndrome Coronavirus (SARS-CoV) and Middle East Respiratory Syndrome Coronavirus (MERS-CoV), which have killed hundreds of people in the past 17 years. The World Health Organisation (WHO) has named the new coronavirus 2019-nCoV.

The name of coronavirus comes from its shape, which resembles a crown or solar corona when imaged using an electron microscope. The electron microscopic image, reveals the crown shape structural details for which the coronavirus was named. This image is of the Middle East Respiratory Syndrome Coronavirus (MERS-CoV).

Coronavirus is transmitted through the air and primarily infects the upper respiratory and gastrointestinal tract of mammals and birds. Though most of the members of the coronavirus family only cause mild flu-like symptoms during infection, SARS-CoV and MERS-CoV can infect both upper and lower airways and cause severe respiratory illness and other complications in humans. This new 2019-nCoV causes similar symptoms to SARS-CoV and MERS-CoV. People infected with these coronaviruses suffer a severe inflammatory response. Unfortunately, there is no approved vaccine or antiviral treatment available for coronavirus infection. A better understanding of the life cycle of 2019-nCoV,

including the source of the virus, how it is transmitted and how it replicates are needed to both prevent and treat the disease.

126. Taiwanese Krait or the Chinese Krait might be the original source of the newly discovered coronavirus, is a highly venomous species of elapid snake found in much of
(a) Central China (b) Southern China
(c) South-East Asia (d) All of these

Sol. (d) The many-banded krait (*Bungarus multicinctus*), also known as the Taiwanese Krait or the Chinese krait, is a highly venomous species of elapid snake found in much of Central and Southern China and South-East Asia.)

127. Coronavirus affected sick travellers from Wuhan have infected people in China and other countries, including

(a) Tanzania (b) Australia (c) Uganda (d) Congo

Sol. (b) The illness was first reported in late December 2019 in Wuhan, a major city in Central China and has been rapidly spreading. Since then, sick travellers from Wuhan have infected people in China and other countries, including the United States, India, Japan, Australia, Singapore, Hong-Kong.

128. The Pathogen responsible for pandemic of China is a new coronavirus. The WHO has named the new coronavirus 2019 as

(a) SARS-CoV (b) MERS-CoV
(c) nCoV (d) W-CoV

Sol. (c) The pathogen responsible for pandemic of China is a new coronavirus. The World Health Organisation (WHO) has named the new coronavirus 2019-nCoV. It's in the same family of viruses as the well-known Severe Acute Respiratory Syndrome Coronavirus (SARS-CoV) and Middle East respiratory syndrome Coronavirus (MERS-CoV), which have killed hundreds of people in the past 17 years.

129. The electron microscopic image of the virus depicts which shape and structure of coronavirus?

(a) Helical shape
(b) Icosahedral shape
(c) Prolate shape
(d) Crown shape

Sol. (d) The electron microscopic image, reveals the crown shape structural details for which the coronavirus was named.

130. Severe Acute Respiratory Syndrome Coronavirus and Middle East Respiratory Syndrome Coronavirus can infect

(a) upper airways
(b) lower airways
(c) Both a and b
(d) None of the above

Sol. (c) Most of the members of the coronavirus family only cause mild flu-like symptoms during infection, Severe Acute Respiratory Syndrome Coronavirus (SARS-CoV) and Middle East Respiratory Syndrome Coronavirus (MERS-CoV) can infect both upper and lower airways and cause severe respiratory illness and other complications in humans.

CASE 2

The Sveriges Riksbank Prize in Economic Sciences in Memory of Alfred Nobel 2019 (commonly known as the Nobel prize for economics) has been awarded to Abhijit Banerjee, Esther Duflo and Michael Kremer "for their experimental approach to alleviating global poverty."

Through the award, the Nobel committee recognised both the significance of development economics in the world today and the innovative approaches developed by these three economists.

Esther Duflo is also only the second woman to be awarded the prize (after Elinor Ostrom in 2009). Banerjee, who is also her husband, is the third ever non-white recipient (after Arthur Lewis in 1979 and Amartya Sen in 1998).

In a recent issue of the journal Nature, Goran Hansson, head of the Royal Swedish Academy of Sciences that awards the Nobel, highlighted measures to address the imbalance in gender and ethnicity among winners.

He said "we are making sure to elect women to the academy" from which the prize-awarding committees for the chemistry, physics and economics Nobels are drawn. The first woman to win the John Bates Clark Medal for top economists under 40, an important indicator of who will be awarded the economics Nobel in the future, Susan Athey, only did so in 2007.

Esther Duflo was the second winner in 2010. Since then, women winners of the Clark medal have been more frequent.

Of course, award decisions are made strictly on significance of contributions. But, based on this evidence, perhaps Athey, Amy Finkelstein (who won the medal in 2012) and Emi Nakamura (who won it in 2019) will not be far behind.

131. The Sveriges Riksbank Prize in Economic Sciences has been awarded to

- (a) Abhijit Banerjee
- (b) Esther Duflo
- (c) Michael Kremer
- (d) All of the above

Sol. (d) The Sveriges Riksbank Prize in Economic Sciences in Memory of Alfred Nobel 2019 (commonly known as the Nobel prize for economics) has been awarded to Abhijit Banerjee, Esther Duflo and Michael Kremer.

132. Esther Duflo is also only the second woman to be awarded the Nobel prize after

- (a) Goran Hansson
- (b) Elinor Ostrom
- (c) Susan Athey
- (d) Emi Nakamura

Sol. (b) Esther Duflo is also only the second woman to be awarded the Nobel prize after Elinor Ostrom in 2009.

133. Abhijit Banerjee is the third ever non-white recipient of Nobel prize for economics after

- (a) Arthur Lewis and Amartya Sen
- (b) Goran Hansson and Amartya Sen
- (c) Elinor Ostrom and Amartya Sen
- (d) Susan Athey and Emi Nakamura

Sol. (a) Abhijit Banerjee, is the third ever non-white recipient of the nobel prize for economics (after Arthur Lewis in 1979 and Amartya Sen in 1998).

134. The first woman to win the John Bates Clark Medal for top economists under 40 is

- (a) Susan Athey
- (b) Goarn Hasson
- (c) Elinor Ostrom
- (d) None of the above

Sol. (a) The first woman to win the John Bates Clark Medal for top economists under 40 was Susan Athey, she was awarded by the medal in 2007.

CASE 3

In the 16th century, an age of great marine and terrestrial exploration, Ferdinand Magellan led the first expedition to sail around the world. As a young Portuguese noble, he served the king of Portugal, but he became involved in the quagmire of political intrigue at court and lost the king's favour.

After he was dismissed from service by the king of Portugal, he offered to serve the future Emperor Charles V of Spain.

A papal decree of 1493 had assigned all land in the New World, West of 50 degrees W longitude to Spain and all the land East of that line to Portugal. Magellan offered to prove that the East Indies fell under Spanish authority. On 20th September, 1519, Magellan set sail from Spain with Five ships.

More than a year later, one of these ships was exploring the topography of South America in search of a water route across the continent. This ship sank, but the remaining four ships searched along the Southern peninsula of South America.

Finally they found the passage they sought near 50 degrees S latitude. Magellan named this passage the Strait of All Saints, but today it is known as the Strait of Magellan.

One ship deserted while in this passage and returned to Spain, so fewer sailors were privileged to gaze at that

first panorama of the Pacific Ocean. Those who remained, crossed the meridian, now known as the International Date Line in the early spring of 1521 after 98 days in the Pacific Ocean. During those long days at sea, many of Magellan's men died of starvation and disease.

Later, Magellan became involved in an insular conflict in the Philippines and was killed in a tribal battle. Only one ship and 17 sailors under the command of the Basque navigator Elcano survived to complete the westward journey to Spain and thus prove once and for all that the world is round, with no precipice at the edge.

135. Which of the following century is known as 'an age of great marine and terrestrial exploration'.

- (a) 17th century (b) 18th century
(c) 16th century (d) 15th century

Sol. (c) It was the 16th century that was widely considered as the era of great marine and terrestrial explorations. It was Ferdinand Magellan who led the first expedition in this era.

136. After being dismissed from service of Portuguese king, Magellan served under which king?

- (a) Charles V of Britain (b) Charles V of Spain
(c) George IV of Britain (d) Czar of Russia

Sol. (b) After being dismissed from service of Portuguese King, Magellan served under Spanish king Charles V of Spain who assigned a papal decree to him to go for expedition.

137. The passage which was discovered by Magellan is known by which name today?

- (a) Strait of Hormuz (b) Strait of Gibraltar
(c) Strait of Magellan (d) Strait of Charles

Sol. (c) Magellan discovered a passage through his expedition and named it as Strait of All Saints which is known as Strait of Magellan today.

138. In which year, Spanish Ship crossed International date line

- (a) 1525 (b) 1500 (c) 1498 (d) 1521

Sol. (d) From Spanish Ships crossed the meridian, now known as the International Date Line in the early spring 1521.

139. Under whose command, the only surviving ship returned to Spain and proved that world is round?

- (a) Ferdinand Magellan (b) Elcano
(c) Christopher Columbus (d) John Cabot

Sol. (b) Only one Ship and 17 Sailors under the command of the Basque navigator Elcano survived to complete the journey to Spain and thus proving that world is round.

Directions (Q. Nos. 140-150) In each of these questions a passage is followed by several inferences. You have to examine each inferences separately in the context of the passage and decide upon its degree of truth or falsity.

- (a) if the inference is 'definitely true' i.e. it directly follows from the facts given in the passage.
(b) if the inference is 'probably true' i.e. through not definitely true in the light of facts given.
(c) if you think the inference is 'probably false' though not definitely false in the light of facts given.
(d) if you think the inference is 'definitely false' i.e. it contradicts the given facts.

CASELET 1

Sanitation is one of the biggest problems in India. There are about 700 million people who have no access to toilets at home. Slum areas do not have toilets. People are thus forced to defecate in the open, which causes numerous diseases like diarrhoea, cholera, dehydration etc. Many rural schools also have no toilets, because of which parents do not send their kids, especially girls, to school.

Due attention was drawn towards this problem by Gandhiji but nothing much was done. A growing population is the biggest challenge causing these problems.

For example, the sewage system in Delhi was designed to meet the needs of a population of three million people. But Delhi now has more than 14 million of population. This is not just the case of Delhi; every state and region in India is the same.

Though 12 million toilets claim to have been built under Swachh Sharat Abhiyan in the last five years, as per a UN report, 44% of the population continues to defecate in the open. Sanitation, solid waste management, and drainage continue to pose challenges.

A ranking exercise was taken up by the Government of India called 'Swachh Survekshan' to assess rural and urban areas for their levels of cleanliness and active implementation of Swachhata mission initiatives in a timely and innovative manner.

The objective of the survey is to encourage large scale citizen participation and create awareness amongst all sections of society about the importance of working together towards making towns and cities a better place to live in. Additionally, the survey also intends to foster a spirit of healthy competition among towns and cities to improve their service delivery to citizens, towards creating cleaner cities and towns.

140. A growing population is the biggest challenge causing problems related to sanitation.

Sol. (a) The statement is 'definitely true' i.e. it directly follows from the fact given in the passage.

141. There is a lack of good hygiene habits and inadequacy of social support in society that made sanitation a major problem in the country.

Sol. (b) The statement is 'probably true' though not definitely true as it is not said in a definite way in the passage. The passage only give hints for the given and indicate that slum areas do not have toilets and people are thus forced to defecate in the open which cause diseases.

142. Objective Of 'Swachh Survekshan Mission' is to encourage people to go for cleanliness activities individually and neglect group activities.

Sol. (d) The statement is 'definitely false' as passage mentioned that Swachh Survekshan create awareness among people to work together for cleanliness.

143. 'Swachh Survekshan' exercise to assess rural and urban areas for their levels of cleanliness have increased the healthy competition among states.

Sol. (a) The inference is definitely true as it is indicated from the facts given in the passage.

144. Most of the cities are doing good in terms of sanitation except few such as Delhi, Mumbai.

Sol. (c) This inference is 'probably false'. As per passage most of the cities and areas are not doing good but explicit facts are not given in this regard in the passage.

CASELET 2

Availability of clean cooking fuel is a major challenge for rural households in India. This deprivation is predominantly suffered by women and children as they are the most exposed to harmful effects of smoke from burning unclean fuels in the households.

In order to safeguard the health of women and children by providing them with a clean cooking fuel- LPG, the Government of India (GoI) launched (1st May, 2016) Pradhan Mantri Ujjwala Yojana (PMUY). The scheme aims to provide five crore deposit-free LPG connections to women belonging to Below Poverty Line (BPL) households appearing in Socio-Economic and Caste Census (SECC2011) and suffering with at least one deprivation.

In SECC-2011 Census survey, Ministry of Rural Development (MoRD) enumerated 24.49 crore (17.97 crore rural and 6.52 crore urban) households in the country. Out of these, 10.31 crore households (8.72 crore rural (48.53 per cent) and 1.59 crore urban (24.39 per cent)) suffered with at least one deprivation, which were

identified by the GoI for release of five crore LPG connections under PMUY.

PMUY provides that an amount of ₹ 1600 per LPG connection towards security deposit for LPG Cylinder, Pressure Regulator and Installation Charges etc. would be borne by the Government as one-time financial assistance to adult women of BPL households included in the SECC-2011 and who are not already having any LPG connection in their household. It also prescribed that the Oil Marketing Companies (OMCs) viz. Indian Oil Corporation Limited (IOCL), Bharat Petroleum Corporation Limited (BPCL) and Hindustan Petroleum Corporation Limited (HPCL) would provide an option to PMUY beneficiaries to opt for loan, if they so desire, to cover the cost of a cooking stove and first refill. EMI of loan amount would be recovered by the OMCs from the subsidy amount due to the beneficiaries on refills.

145. It was women and children who mostly expose due to burning of unclean fuel in household.

Sol. (a) The statement is definitely true as it is indicated from the facts given in the para 1.

146. Giving gas cylinder in the name of women will strengthen their economic status in family.

Sol. (b) The inference is 'probably true' but not definitely true as the explicit conclusion couldn't be drawn through the given passage.

147. Though Cylinder will be provided free of cost, the charges of pressure regulator and installation charges will be borne by beneficiary.

Sol. (d) The inference is clearly false as passage has mentioned that this charge will be borne by Government.

148. Putting cost of cooking stove and refill on beneficiary will become hindrance for BPLs to go for refilling of cylinders.

Sol. (b) Inference seems to be true but direct facts regarding this inference are not provided in the passage.

149. The major challenge for normal households in India is the availability of cooking fuel.

Sol. (a) The inference is definitely true as it is indicated from the facts given in the passage.

150. PMUY also prescribed OMCs, IOCL, BPCL and HPCL to opt for loan if they desire to cover the cost of a cooking stove and first refill.

Sol. (a) The inference is definitely true as it is indicated from the facts given in the passage.