## Solutions

1. Ans. D.
$4.7+0.6=5.3$
$5.3+1.2=6.5$
$6.5+1.8=8.3$
$8.3+2.4=10.7$
2. Ans. B.

7*1-1 = 6,
$6 * 2-2=10$,
10*3-3=27
$27 * 4-4=104$,
$104 * 5-5=515$
3. Ans. B.
$11 * 0.5+0.5=6$
6*1+1 = 7
$7 * 2+2=16$
$16 * 4+4=68$
So, next number will be
$68 * 8+8=552$
4. Ans. A.

The given series shows the pattern
$13=6 * 2+1$
$38=13 * 3-1$
? $=38 * 4+1=153$
$764=153 * 5-1$
$4585=764 * 6+1$
5. Ans. E.

This series following this pattern,
$\times 1+2, \times 2+3, \times 3+4, \times 4+5, \times 5+6$
$=273 \times 5+6=1371$
6. Ans. E.
$11200 \div 5=2240$
$2240 \div 4=560$
$560 \div 5=112$
$112 \div 4=28$
$28 \div 5=5.6$
7. Ans. C.

According to the given equations:
I. $x^{2}-9 x+18=0$
$x^{2}-3 x-6 x+18=0=0$
$x(x-3)-6(x-3)=0$
$(x-3)(x-6)=0$
$\mathrm{x}=3,6$
II. $y^{2}-11 y+18=0$

$$
\begin{aligned}
& y^{2}-9 y-2 y+18=0 \\
& y(y-9)-2(y-9)=0 \\
& (y-2)(y-9)=0 \\
& y=2,9
\end{aligned}
$$

After comparison of both equations, the conclusion is
$\mathrm{x}=\mathrm{y}$ or no relation is obtained
So option (c) is the correct answer.
8. Ans. B.
I. $x^{2}-16 x+63=0$
or, $x^{2}-9 x-7 x+63=0$
or, $x(x-9)-7(x-9)=0$
or, $(x-7)(x-9)=0$
$\therefore \mathrm{x}=7,9$
II. $\mathrm{y}^{2}-2 \mathrm{y}-35=0$
or, $\mathrm{y}^{2}-7 \mathrm{y}+5 \mathrm{y}-35=0$
or, $\mathrm{y}(\mathrm{y}-7)+5(\mathrm{y}-7)=0$
or, $(y-7)(y+5)=0$
$\therefore y=7,-5$
Hence, $x \geq y$
9. Ans. D.
$x^{2}+x-42=0$
$x^{2}+7 x-6 x-42=0$
$x(x+7)-6(x+7)=0$
$(x+7)(x-6)=0$
$(x+7)=0$ or $(x-6)=0$
$x=-7$ or $x=6$
$y^{2}-13 y+42=0$
$y^{2}-7 y-6 y+42=0$
$y(y-7)-6(y-7)=0$
$(y-7)(y-6)=0$
$(y-7)=0$ or $(y-6)=0$
$y=7$ or $y=6$
$x \leq y$
10. Ans. C.

From I : $x^{2}-7 x+6=0$
$(x-6)(x-1)=0$

Thus, $x=1$ or 6
From II : $11 \mathrm{y}^{2}-13 \mathrm{y}+2=0$
$(11 y-1)(y-2)=0$
Thus, $y=1$ or $2 / 11$
$x \geq y$
11. Ans. B.
$(2 X+5 Y=31) \times 3$
$(7 X+3 Y=36) \times 5$
$6 \mathrm{X}+15 \mathrm{Y}=93$
$35 \mathrm{X}+15 \mathrm{Y}=180$

| - | - |
| :--- | :--- |
| $29 X$ | $=87$ |

$\quad \frac{87}{29}$
$X=3$
Substituting in $2 X+5 Y=31$
$2 \times 3+5 Y=31$
$6+5 Y=31$
$5 Y=31-6$
$5 Y=25$
$Y=5$
$X<Y$
12. Ans. C.
$20 x^{2}-81 x+63=0$
$20 x^{2}-60 x-21 x+63=0$
$20 x(x-3)-21(x-3)=0$
$(x-3)(20 x-21)=0$
$x=\frac{21}{20}, 3-----E q .1$
$20 y^{2}-y-21=0$
$20 y^{2}+20 y-21 y-21=0$
$20 y(y+1)-21(y+1)=0$
$(20 y-21)(y+1)=0$
$y=\frac{21}{20},-1-----E q .2$
From Eq. 1 and Eq. 2, we get
$x \geq y$.
13. Ans. B.

From the table,
Number of pens manufacture by Company R in the year $2009=42.6$ crores
Number of pens manufactured by Company $T$
in the year $2008=30.4$ crores
Ratio of the number of pens manufactured by Company R in the year 2009 to that of those manufactured by Company T in the year
$2008=42.6: 30.4=213: 152$
14. Ans. A.

From the table,
Number of pens manufactured by company P
in the year $2008=21.8$ crores
Number of pens manufactured by company P
in the year $2009=53.0$ crores
\% increase in the number of pens
manufactured by Company P in the year
2009, from the previous
year $=\frac{53-21.8}{21.8} \times 100 \%=143.11 \% \approx 143 \%$
15. Ans. B.

Average = sum of quantities/total number of quantities
From the given table,
Number of pens manufactured in year 2007
by company $\mathrm{P}=36.6$ crores
Number of pens manufactured in year 2007
by company $\mathrm{Q}=18.1$ crores
Number of pens manufactured in year 2007
by company $\mathrm{R}=38.7$ crores
Number of pens manufactured in year 2007
by company $\mathrm{S}=43.6$ crores
Number of pens manufactured in year 2007
by company $\mathrm{T}=24.1$ crores
Number of pens manufactured in year 2007
by company $\mathrm{U}=40.5$ crores
Average number of pens manufactured in year 2007 by companies
$36.6+18.1+38.7+43.6+24.1+40.5$
6
$=33.6$ crores $=336000000$
16. Ans. E.

Number of pens made by Company Q in 2005 = 36.5 crores
Number of pens made by Company Q in all the given years = Sum of number of pens made in each individual year.
$\Rightarrow$ Number of pens made by Company Q in all
the given years $=51.6+36.5+43.5+18.1$ $+23.5+35.7=208.9$ crores
\% of number of pens made by Company Q in 2005 out of the total made by company
$\mathrm{Q}=\frac{36.5}{208.9} \times 100 \%=17.4 \% \approx 17 \%$
17. Ans. D.

Let the number of more pens need to be manufactured by Company $S$ in the year 2009 to make the ratio of the number of pens manufactured by Company $S$ to that of those manufactured by Company $U$ in the year 2009 as 54:83 be 'a'.
Number of pen made by Company $S$ in the year $2009=26.5$ crores
Number of pen made by Company $U$ in the year $2009=41.5$ crores
$\therefore\left(\frac{26.5+a}{41.5}\right)=\frac{54}{83}$
$\Rightarrow 2199.5+83 a=2241$
$\Rightarrow 83 \mathrm{a}=41.5$
$\Rightarrow \mathrm{a}=0.5$ crores $=5000000$
18. Ans. D.
total sweets
$=80 \times \frac{15}{100} \times 80+5 \times \frac{25}{100} \times 80=1,060$
19. Ans. D.

On opening the three pipes simultaneously,
Part of tank filled in 1 hour $=\frac{1}{18}+\frac{1}{15}-\frac{1}{45}$
$=\frac{5+6-2}{90}=\frac{9}{90}=\frac{1}{10}$
Required Time $=10$ minutes
20. Ans. C.

Let the $C P=100 X$
MP= 140X
Difference between Discount \% is 10-5= 5 \%
Difference between the discount given=
$(140 X) *(5 / 100)=7 X$
This means, $7 X \equiv 35$
$\rightarrow 100 \mathrm{X} \equiv 500$
Hence the $C P=500$
Then, original MP $=500 \times \frac{140}{100}=700$
After giving 30\%, the selling price=
$700 \times \frac{70}{100}=490$
$\therefore$ there is a loss of $500-490=$ Rs. 10
Loss $\%=\frac{10}{500} \times 100=2 \%$
21. Ans. B.

Let the capacity of the stall be $x$ and the capacity of the balcony be $y$.
Now, $x+y=3000$ $\qquad$
Also, $100 x+150 y=400000$
i.e., $x+1.5 y=4000$ $\qquad$ (ii)
(ii)-(i) gives
$0.5 y=1000$, i.e., $y=2000$
$\therefore \mathrm{x}=1000$.
Hence, option is b.
22. Ans. E.

The ratio of incomes of $A$ and $B$ are 5:9
Let their incomes be $5 x: 9 x$ and their savings be $3 y$ :5y
B saving=9x*2/3
=6x
So $6 x=5 y$
$x=5 y / 6$
The ratio of their expenditures
( $5 x-3 y$ ) : ( $9 x-5 y$ )
Substituting the value of $x$ in the above equation we get
$=7 y: 15 y$
=7:15
23. Ans. C.

From the graph,
The no. of refrigerators sold in $2001=600$ The no. of washing machines sold in $2001=$ 380
So, the total sale in $2001=600+380=$ 980
And,
The no. of refrigerators sold in $2005=540$
The no. of washing machines sold in $2005=$ 500
So, the total sale in $2005=540+500=$ 1040
$\therefore$ The required ratio $=980: 1040=49: 52$.
24. Ans. B.

From the graph,

| Year | No. of refrigerators <br> sold (A) | No. of washing <br> machines sold (B) | Total sale <br> $=A+B$ |
| :--- | :--- | :--- | :--- |
| 2001 | 600 | 380 | $600+380=980$ |
| 2002 | 580 | 420 | $580+420=1000$ |
| 2003 | 460 | 475 | $460+475=935$ |
| 2004 | 525 | 445 | $525+445=970$ |
| 2005 | 540 | 500 | $540+500=1040$ |
| 2006 | 535 | 480 | $535+480=1015$ |

$\therefore$ We can clearly observe that the total sale was the second highest in 2006.
25. Ans. C.

From the graph,

| Year | No. of refrigerators <br> sold (A) | No. of washing <br> machines sold (B) | Total sale <br> $=A+B$ |
| :--- | :--- | :--- | :--- |
| 2001 | 600 | 380 | $600+380=980$ |
| 2002 | 580 | 420 | $580+420=1000$ |
| 2003 | 460 | 475 | $460+475=935$ |
| 2004 | 525 | 445 | $525+445=970$ |
| 2005 | 540 | 500 | $540+500=1040$ |
| 2006 | 535 | 480 | $535+480=1015$ |

$\therefore$ We can clearly say that for 3 years, the total sale was less than 1000.
26. Ans. A.

From the graph,
The no. of washing machines sold in $2003=$ 475
The total no. of washing machines sold in the given years
$=380+420+475+445+500+480=$
2700
So, the average no. of washing machines
sold in the given years $=2700 / 6=450$.
$\therefore$ The required difference $=475-450=25$.
27. Ans. D.

From the graph,
The no. of refrigerators sold in $2001=600$
The total no. of refrigerators sold in the given years
$=600+580+460+525+540+535=$ 3240
Then, the average no. of refrigerators sold in the given years
= $3240 / 6=540$
$\therefore$ The required percentage $=[(540 / 600) \times$ $100] \%=90 \%$.
28. Ans. C.

Let a Rat takes W days \& a Mouse takes C days to eat up 50 kg rice alone.
6 rats together can eat up a stock of 100 kg rice in = 15 days
So, 6 rats together can eat up a stock of 50 kg rice in $=7.5$ days
Now, Let 10 mice takes ' $x$ ' days to eat up the stock
ATQ
$(6 W+10 C) \times 5=6 W \times 7.5 \Rightarrow 10 C=3 W$

So, $6 \mathrm{~W} \times 7.5=10 \mathrm{C} \times x \Rightarrow 20 \mathrm{C} \times 7.5=10 \mathrm{C}$
$x \quad x \Rightarrow x=15$ days
29. Ans. D.

Cost price $=$ Rs. 800
Loss $=8 \%$
Selling price $=800-(800 * 8 / 100)$
= Rs. $800-64$
= Rs. 736
Reduction 5\% = 736 * 5/100
= Rs. 36.80
Reduced Selling Price $=736-36.80$
= Rs. 699.20
Selling price = Rs. $699.20 \approx 700$
30. Ans. D.

Let present ages of man and wife are $4 x$ and $3 x$ years respectively.
$\therefore \frac{4 x+4}{3 x+4}=9 / 7$
$\Rightarrow X=8$ years
Present age of man $=32$ years
Present age of wife $=24$ years
Now, let 'y' years ago they were married
$\therefore \frac{32-y}{24-y}=\frac{5}{3}$
$\Rightarrow 96-3 y=120-5 y$
$\Rightarrow Y=12$ years
31. Ans. A.

From the pie-chart,
The number of items produced by company A $=3960$
Percentage of items produced by company A $=11$
So, the total no. of items produced by six companies together
$=3960 \times(100 / 11)=36000$
Percentage of items produced by company C $=5$
Percentage of items produced by company F = 27
So, the total no. of items produced by company C and F
$=36000 \times(5+27) \%=36000 \times(32 / 100)$
$=11520$
$\therefore$ The total no. of items produced by company A, C, and F
$=11520+3960=15480$
32. Ans. C.

From the pie-chart,
The no. of items produced by company $A=$ 3960
Percentage of items produced by company A = 11
So, the total no. of items produced by six companies together
$=3960 \times(100 / 11)=36000$
Percentage of items produced by company B $=15$
Percentage of items produced by company E $=24$
$\therefore$ The required difference $=36000 \times(24-$
$15) \%=36000 \times(9 / 100)=3240$
33. Ans. B.

From the pie-chart,
The no. of items produced by company $A=$ 3960
Percentage of items produced by company A = 11
So, the total no. of items produced by six companies together
$=3960 \times(100 / 11)=36000$
Percentage of items produced by company C $=5$
So, the no. of items produced by company C $=36000 \times(5 / 100)=1800$
Percentage of items produced by company D = 18
So, the no. of items produced by company $D$ $=36000 \times(18 / 100)=6480$
$17 \%$ and $25 \%$ items are defective for the company C and D respectively.
Then, the no. of defective items produced by company $C=1800 \times(17 / 100)=306$
And, the no. of defective items produced by
company $D=6480 \times(25 / 100)=1620$
$\therefore$ The required ratio $=306: 1620=17: 90$.
34. Ans. D.

From the pie-chart,
The no. of items produced by company $A=$ 3960
Percentage of items produced by company A = 11
So, the total no. of items produced by six companies together
$=3960 \times(100 / 11)=36000$
Then, the average no. of items produced by
all companies $=36000 / 6=6000$
The no. of items produced by company $\mathrm{E}=$ 24
So, the no. of items produced by company $E$
$=36000 \times(24 / 100)=8640$
$\therefore$ The required percentage $=[(8640 / 6000) \times$ 100]\% = 144\%.
35. Ans. B.

From the pie-chart,
Total pie-chart = 100\%
Total central angle of the pie-chart $=360^{\circ}$
Percentage of items produced by company $F$
$=27$
$\therefore$ The central angle corresponds to the no. of items produced by company F
$=(360 \% / 100) \times 27=97.2^{\circ}$
1 Degree $=60 \mathrm{~min}$
0.1 degree $=6 \mathrm{~min}$
0.2 degree $=12 \mathrm{~min}$
therefore,
$97.2^{\circ}=97^{\circ} 12^{\prime}$.
36. Ans. D.

Let, $A$ 's investment $=2 x$
B's investment $=3 x$
C's investment $=4 x$
Let, A's profit $=4 y$
B's profit $=3 y$
C's profit $=2 y$
Let, Time of investment of $A=a$
Time of investment of $B=b$
Time of investment of $C=c$
According to problem,
$\Rightarrow 2 x \times a=4 y$
$\Rightarrow a=2 y / x$
According to problem,
$\Rightarrow 3 x \times b=3 y$
$\Rightarrow b=y / x$
According to problem,
$\Rightarrow 4 x \times c=2 y$
$\Rightarrow c=y / 2 x$
$\therefore$ ratio of time for which the capital has been invested,
$\Rightarrow a: b: c$
$\Rightarrow(2 y / x):(y / x):(y / 2 x)$
$\Rightarrow 2: 1: 1 / 2$
$\Rightarrow 4: 2: 1$
37. Ans. C.
S.P of Ist buffalo $=$ Rs 12000

Profit $=20 \%$

Attempt Now
$C . P=S . P /(100+P \%) * 100$
=> $12000 / 120$ * 100
=> Rs 10000
S.P of 2nd buffalo = Rs 13000

Profit = 30\%
C. $P=13000 / 130 * 100$
=> Rs 10000
S.P of 3rd buffalo = Rs 31000
overall profit $=40 \%$
Total S.P $=12000+13000+31000$
=> Rs56000
Total C.P = 56000/140 * 100
=> Rs 40000
C.P of 3rd buffalo = total C.P - [C.P of 1st
buffalo + C.P of 2nd buffalo]
$=>40000-[10000+10000]$
=> Rs 20000
38. Ans. B.

Let the total salary $=100 x$
Investment on shopping $=13 \%$ of $100 x=$ $13 x$
Remaining amount $=(100 x-13 x)=87 x$
Investment on savings $=(9 / 29) * 87 x=27 x$
Difference of savings and shopping $=9800$
[Given]
$27 x-13 x=9800$
$14 x=9800$
$x=700$
$\therefore$ salary $=100 x=100 * 700=$ RS 70000
Remaining amount $=100 x$ - (Investment on
shopping + Investment on savings)
$=100 x-(13 x+27 x)=60 x$
Let the amount spent on house rent and loans $=y$
$\therefore 40 \mathrm{x}-2 \mathrm{y}=4000$
$x=700$
$28000-2 y=4000$
$28000-4000=2 y$
So,
$y=24000 / 2=$ Rs 12000
39. Ans. D.
$\frac{x}{y}=\frac{9}{16}$
$\frac{x+10}{y+10}=\frac{2}{3}$
After solving $y=32, x=18$
40. Ans. C.

Let the speed of the boat is Sb and the speed of water is Sw
So, $\rightarrow$ Upstream Speed $=$ Sb-Sw
$15 \mathrm{Km} / \mathrm{hr}=20-\mathrm{Sw}$
$\mathrm{S} w=5 \mathrm{Km} / \mathrm{hr}$
Downstream Speed $=25$
So, distance is $4 \times(20+5)=100 \mathrm{Km}$.
41. Ans. E.

Required difference $=266-165=101$
Males in company $=\frac{86}{19+86} \times 1650=860$
Females in company $=1650-860=790$
Males in designing department $=198$
Employees in quality department
$=\frac{18}{100} \times 1650=297$
Males in quality department
$=\frac{5}{9} \times 297=165$
Females in quality department $=132$
Males in maintenance department $=77$
Females in maintenance department
$=\frac{5}{7} \times 77=55$
Females in designing department $=165$
Males in HR department $=77 \times 2=154$
Males in production department $=860-$
$(198+165+77+154)=266$
Females in production department
$=\frac{19}{14} \times 266=361$
Females in HR department $=790-(132+$
$55+165+361)=77$
42. Ans. B.

Required percentage
$=\frac{361}{790} \times 100 \approx 45.7 \%$
Males in company $=\frac{86}{19+86} \times 1650=860$
Females in company $=1650-860=790$
Males in designing department $=198$
Employees in quality department
$=\frac{18}{100} \times 1650=297$
Males in quality department
$=\frac{5}{9} \times 297=165$
Females in quality department $=132$
Males in maintenance department $=77$

Females in maintenance department
$=\frac{5}{7} \times 77=55$
Females in designing department $=165$
Males in HR department $=77 \times 2=154$
Males in production department $=860-$
$(198+165+77+154)=266$
Females in production department
$=\frac{19}{14} \times 266=361$
Females in HR department $=790-(132+$
$55+165+361)=77$
43. Ans. B.

Required percentage
$=\frac{165-55}{165} \times 100=66 \frac{2}{3} \%$
Males in company $=\frac{86}{19+86} \times 1650=860$
Females in company $=1650-860=790$
Males in designing department $=198$
Employees in quality department
$=\frac{18}{100} \times 1650=297$
Males in quality department
$=\frac{5}{9} \times 297=165$
Females in quality department $=132$
Males in maintenance department $=77$
Females in maintenance department
$=\frac{5}{7} \times 77=55$
Females in designing department $=165$
Males in HR department $=77 \times 2=154$
Males in production department $=860-$
$(198+165+77+154)=266$
Females in production department
$=\frac{19}{14} \times 266=361$
Females in HR department $=790-(132+$
$55+165+361)=77$
44. Ans. B.

No. of males in designing, quality and HR departments
$=198+165+154=517$
No. of females in Designing, maintenance and production department
$=361+55+165=581$
Difference $=64$
Males in company $=\frac{86}{19+86} \times 1650=860$

Females in company $=1650-860=790$
Males in designing department $=198$
Employees in quality department
$=\frac{18}{100} \times 1650=297$
Males in quality department
$=\frac{5}{9} \times 297=165$
Females in quality department $=132$
Males in maintenance department $=77$
Females in maintenance department
$=\frac{5}{7} \times 77=55$
Females in designing department $=165$
Males in HR department $=77 \times 2=154$
Males in production department $=860-$
$(198+165+77+154)=266$
Females in production department
$=\frac{19}{14} \times 266=361$
Females in HR department $=790-(132+$
$55+165+361)=77$
45. Ans. B.

Females shifted from quality
Department $\frac{5}{12} \times 132=55$
Females in HR department $=77+55=132$
Makes in HR department $=154$
154
$\overline{132}=1.17$
Males in company $=\frac{86}{19+86} \times 1650=860$
Females in company $=1650-860=790$
Males in designing department $=198$
Employees in quality department
$=\frac{18}{100} \times 1650=297$
Males in quality department
$=\frac{5}{9} \times 297=165$
Females in quality department $=132$
Males in maintenance department $=77$
Females in maintenance department
$=\frac{5}{7} \times 77=55$
Females in designing department $=165$
Males in HR department $=77 \times 2=154$
Males in production department $=860-$
$(198+165+77+154)=266$

Females in production department
$=\frac{19}{14} \times 266=361$
Females in HR department $=790-(132+$
$55+165+361)=77$
46. Ans. C.

Let the distance be x km .
$\mathrm{x} / 60-(200-\mathrm{x}) / 80=1$
$(4 x-600+3 x) / 240=1$
$7 x-600=240$
$\mathrm{X}=120 \mathrm{~km}$.
47. Ans. C.

Acc to LCM method

P 30
$\operatorname{Eff}(P)=6$
LCM $=180$
Q 36
$\mathrm{Eff}(\mathrm{Q})=5$
Therefore,
$(5+6) * 5+5 *$ No of days Q works Alone $=$ 180
No of days Q works Alone $=25$
48. Ans. A.
$25 \%=1 / 4$

Price
cons.

$\underbrace{$|  Original  |  New  |
| :--- | :--- |
| 5 | 5 |
| 5 |  |}$_{\text {diff. } 1 \text { unit }}$

So, original price $=\frac{160}{5}=32$ Rs. $/ \mathrm{kg}$.
49. Ans. A.

Required ratio $=\frac{\frac{2}{5} \times 20+\frac{3}{7} \times 28}{\frac{3}{5} \times 20+\frac{4}{7} \times 28}=\frac{20}{28}=\frac{5}{7}$
50. Ans. C.

Happy
Then, are 5 letters.
And number of words formed $=\frac{5!}{2!}$
$=\frac{5 X 4 X 3 X 2 X 1}{2 X 1}=\frac{120}{2}=60$
51. Ans. C.

From the given question,

1. J sits on an extreme end of the line.
2. There are two persons between J and the one who likes Red.
3. The one who likes Yellow sits third to the
right of M. I is on the immediate left of $M$. The person who likes Pink sits second to the left of $I$.
4. The one who likes Blue is an immediate neighbour of the one who likes Yellow.
5. H sits second to the right of N , who likes neither Yellow nor Pink.
6. Only two persons sit between K and the one who likes Red.
7. $G$ and $L$ are immediate neighbours and both of them do not like Yellow.
8. The one who likes Brown sits second to the left of G.
9. One of the immediate neighbours of $M$ likes Black.
10. The person who likes Orange sits second to the right of G .

| J | L | G | I | M | N | K | H |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brown | Pink | Green | Red | Orange | Black | Blue | Yellow |

52. Ans. D.

From the given question,

1. J sits on an extreme end of the line.
2. There are two persons between J and the one who likes Red.
3. The one who likes Yellow sits third to the right of M . I is on the immediate left of M . The person who likes Pink sits second to the left of I.
4. The one who likes Blue is an immediate neighbour of the one who likes Yellow.
5. H sits second to the right of N , who likes neither Yellow nor Pink.
6. Only two persons sit between K and the one who likes Red.
7. G and L are immediate neighbours and both of them do not like Yellow.
8. The one who likes Brown sits second to the left of G.
9. One of the immediate neighbours of $M$ likes Black.
10. The person who likes Orange sits second to the right of G .

| J | L | G | I | M | N | K | H |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brown | Pink | Green | Red | Orange | Black | Blue | Yellow |

53. Ans. A.

From the given question,

1. J sits on an extreme end of the line.
2. There are two persons between J and the

Attempt Now
one who likes Red.
3. The one who likes Yellow sits third to the right of $M$. I is on the immediate left of $M$. The person who likes Pink sits second to the left of I.
4. The one who likes Blue is an immediate neighbour of the one who likes Yellow.
5. H sits second to the right of N , who likes neither Yellow nor Pink.
6. Only two persons sit between K and the one who likes Red.
7. $G$ and $L$ are immediate neighbours and both of them do not like Yellow.
8. The one who likes Brown sits second to the left of $G$.
9. One of the immediate neighbours of M likes Black.
10. The person who likes Orange sits second to the right of G .

| J | L | G | I | M | N | K | H |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brown | Pink | Green | Red | Orange | Black | Blue | Yellow |

54. Ans. B.

From the given question,

1. J sits on an extreme end of the line.
2. There are two persons between J and the one who likes Red.
3. The one who likes Yellow sits third to the right of $M$. I is on the immediate left of $M$.
The person who likes Pink sits second to the left of I .
4. The one who likes Blue is an immediate neighbour of the one who likes Yellow.
5. H sits second to the right of N , who likes neither Yellow nor Pink.
6. Only two persons sit between K and the one who likes Red.
7. $G$ and $L$ are immediate neighbours and both of them do not like Yellow.
8. The one who likes Brown sits second to the left of G.
9. One of the immediate neighbours of $M$ likes Black.
10. The person who likes Orange sits second to the right of G .

| J | L | G | I | M | N | K | H |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brown | Pink | Green | Red | Orange | Black | Blue | Yellow |

55. Ans. C.

From the given question,

1. J sits on an extreme end of the line.
2. There are two persons between J and the one who likes Red.
3. The one who likes Yellow sits third to the right of $M$. I is on the immediate left of $M$. The person who likes Pink sits second to the left of I.
4. The one who likes Blue is an immediate neighbour of the one who likes Yellow.
5. H sits second to the right of N , who likes neither Yellow nor Pink.
6. Only two persons sit between K and the one who likes Red.
7. $G$ and $L$ are immediate neighbours and both of them do not like Yellow.
8. The one who likes Brown sits second to the left of G.
9. One of the immediate neighbours of $M$ likes Black.
10. The person who likes Orange sits second to the right of G .

| J | L | G | I | M | N | K | H |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Brown | Pink | Green | Red | Orange | Black | Blue | Yellow |

56. Ans. D.

The least possible Venn diagram for the given statements is as follows:-


Conclusions:

1) Some ties are not cloths. (It is sure, hence true)
2) Some pins are not shoes. (It is sure, hence true)
Hence, only conclusion both is true.
57. Ans. C.

The least possible Venn diagram for the given statements is as follows:-


Conclusions:

1) Some hike is not amazon. (False)
2) All hike can be amazon (It is a positive
possibility, hence true)
Hence, only conclusion 2 is true.
58. Ans. D.

The least possible Venn diagram for the given statements is as follows:-


Conclusions:

1) Some cottage can be house. (It is a positive possibility, hence true)
2) All bungalow can be cottage (It is a positive possibility, hence true) Hence, only conclusion 1 and 2 are true. 59. Ans. C.

The least possible Venn diagram for the given statements is as follows:-


## Conclusions:

1) Some $Z$ are $Q$. (it is not sure, hence false)
2) All $Z$ are not $Q$ can be a possibility. (it can be possible hence true)
Hence, only conclusion 2 is true.
60. Ans. A.

The least possible Venn diagram for the given statements is as follows:-


Conclusions:

1) Some sugar is not wheat. (It is not sure, hence false)
2) No field is maze. (It is not sure, hence false)
Hence, No conclusion is true.
61. Ans. E.

In the given question we can see that direction sense is also necessary so first of all we have to make a direction sense diagram:


1) Ram is facing to the southwest direction and he goes to Delhi.
2) Ram is sitting in front of the one who is going to Jaipur.
3) Ramesh is sitting opposite to Rama, who does not go to Gurugram and facing south.
4) Ramu is facing north - west direction and likes to go Noida. Rohit is going to Bangalore.

5) Raja, who is going to kota is not facing east direction and he is not sitting between Ram and Ramu.
6) Rupesh is going to Mumbai and is sitting opposite to one who is facing west.
7) Raju is facing north - east direction.
8) The person who sits between the one who likes to go kota and Delhi, is going to Mathura.

62. Ans. C.

In the given question we can see that direction sense is also necessary so first of all we have to make a direction sense diagram:


1) Ram is facing to the southwest direction and he goes to Delhi.
2) Ram is sitting in front of the one who is going to Jaipur.
3) Ramesh is sitting opposite to Rama, who does not go to Gurugram and facing south.
4) Ramu is facing north - west direction and likes to go Noida. Rohit is going to Bangalore.

5) Raja, who is going to kota is not facing east direction and he is not sitting between Ram and Ramu.
6) Rupesh is going to Mumbai and is sitting opposite to one who is facing west.
7) Raju is facing north - east direction.
8) The person who sits between the one who likes to go kota and Delhi, is going to Mathura.


## 63. Ans. E.

In the given question we can see that direction sense is also necessary so first of all
we have to make a direction sense diagram:


1) Ram is facing to the southwest direction and he goes to Delhi.
2) Ram is sitting in front of the one who is going to Jaipur.
3) Ramesh is sitting opposite to Rama, who does not go to Gurugram and facing south.
4) Ramu is facing north - west direction and likes to go Noida. Rohit is going to Bangalore.

5) Raja, who is going to kota is not facing east direction and he is not sitting between Ram and Ramu.
6) Rupesh is going to Mumbai and is sitting opposite to one who is facing west.
7) Raju is facing north - east direction.
8) The person who sits between the one who likes to go kota and Delhi, is going to Mathura.

64. Ans. E.

In the given question we can see that direction sense is also necessary so first of all we have to make a direction sense diagram:

Attempt Now


1) Ram is facing to the southwest direction and he goes to Delhi.
2) Ram is sitting in front of the one who is going to Jaipur.
3) Ramesh is sitting opposite to Rama, who does not go to Gurugram and facing south.
4) Ramu is facing north - west direction and likes to go Noida. Rohit is going to Bangalore.

5) Raja, who is going to kota is not facing east direction and he is not sitting between Ram and Ramu.
6) Rupesh is going to Mumbai and is sitting opposite to one who is facing west.
7) Raju is facing north - east direction.
8) The person who sits between the one who likes to go kota and Delhi, is going to Mathura.

65. Ans. D.

In the given question we can see that direction sense is also necessary so first of all we have to make a direction sense diagram:


1) Ram is facing to the southwest direction and he goes to Delhi.
2) Ram is sitting in front of the one who is going to Jaipur.
3) Ramesh is sitting opposite to Rama, who does not go to Gurugram and facing south.
4) Ramu is facing north - west direction and likes to go Noida. Rohit is going to Bangalore.

5) Raja, who is going to kota is not facing east direction and he is not sitting between Ram and Ramu.
6) Rupesh is going to Mumbai and is sitting opposite to one who is facing west.
7) Raju is facing north - east direction.
8) The person who sits between the one who likes to go kota and Delhi, is going to Mathura.

66. Ans. A.


As per the given diagram, it is clear that $\mathbf{H}$ is a grandson of $B$.
67. Ans. D.


As per the diagram, it is clear that $\mathbf{F}$ is the son-in-law of $A$.
68. Ans. C.


As per the given diagram, $C$ is the sister-inlaw of $F$ 69. Ans. C.


Code for 'each' is either 'hus' or 'pzy'
Code for 'problems' is either 'hlt' or 'mlp'
Code for 'facing' is 'ngi'
Code for 'challenge' is 'riy'
Hence possible code for 'problems facing each challenge' is either 'mlp ngi hus riy' or 'hlt ngi pzy riy'.
70. Ans. A.

Code for 'rts' is either 'on' or 'standard' Code for 'uqp' is either 'is' or 'long' Code for 'nop' is 'day'
Hence possible code for 'rts uqp nop' is either 'on day is' or 'standard long day' but here only one option is available 'on day is' so it is the answer.
71. Ans. E.

Code for 'health' is either 'mlp' or 'hlt'
Code for 'problems' is either 'mlp' or 'hlt'
Code for 'rise' is 'rtv'
Code for standard is either 'sa' or 'rts'
But code for 'health problems rise standard'
is 'hlt mlp rtv rts' above given so we can
assure that 'standard' code is for 'rts'
Hence possible code for 'standard' is 'rts'.
72. Ans. D.

Code for 'problems' is either 'mlp' or 'hlt'.
73. Ans. C.

Code for 'environmental challenge' is 'tgt riy'.
74. Ans. C.

Order of clues to be used:

1) Only three persons visit the site between $A$ and $C$.
2) $C$ visits immediately before $G$ and $B$ visits immediately after A.
2 cases:
Case 1: A B _ _ C G or
Case 2: C G _ _ A B
But case 1 will be eliminated: 3) B visits the site in the month with more than 30 days. Next, we have:
3) Only 2 persons visit the site between $G$ and E .
4) $E$ visits the site before $G$.

Case 2: E_C G__AB
Next, we have:
6) E does not visit the site on 18th of any month.
7) There are two persons who visit the site between $F$ and $H$.
8) F visits the site before H and does not visit in the month with 31 days.
9) A does not visit in a month with 30 days and $B$ does not visit the site before or after H .
10) One person visits between $B$ and $D$.

This is our final case which follows all the
conditions.
10 FEB--E
18 FEB--F
10 APR--C
18 APR--G
10 JUL--H
18 JUL--D
10 AUG--A
18 AUG-B
75. Ans. C.

## Order of clues to be used:

1) Only three persons visit the site between A and C.
2) $C$ visits immediately before $G$ and $B$ visits immediately after A.
2 cases:
Case 1: A B __ C G or
Case 2: C G __ A B
But case 1 will be eliminated: 3) B visits the site in the month with more than 30 days. Next, we have:
3) Only 2 persons visit the site between G and E .
4) E visits the site before $G$.

Case 2: E_C G $\qquad$ AB
Next, we have:
6) E does not visit the site on 18th of any month.
7) There are two persons who visit the site between $F$ and $H$.
8) F visits the site before H and does not visit in the month with 31 days.
9) A does not visit in a month with 30 days and $B$ does not visit the site before or after H.
10) One person visits between $B$ and $D$.

This is our final case which follows all the conditions.
10 FEB--E
18 FEB--F
10 APR--C
18 APR--G
10 JUL--H
18 JUL--D
10 AUG--A
18 AUG-B
76. Ans. B.

Order of clues to be used:

1) Only three persons visit the site between
$A$ and $C$.
2) $C$ visits immediately before $G$ and $B$ visits immediately after $A$.
2 cases:
Case 1: A B _ C G or
Case 2: $\mathrm{CG}^{--A B}$
But case 1 will be eliminated: 3) B visits the site in the month with more than 30 days. Next, we have:
3) Only 2 persons visit the site between G and E .
4) E visits the site before $G$.

Case 2: E_C G _ _ A B
Next, we have:
6) E does not visit the site on 18th of any month.
7) There are two persons who visit the site between $F$ and $H$.
8) F visits the site before H and does not visit in the month with 31 days.
9) A does not visit in a month with 30 days and $B$ does not visit the site before or after H.
10) One person visits between $B$ and $D$.

This is our final case which follows all the conditions.
10 FEB--E
18 FEB--F
10 APR--C
18 APR--G
10 JUL--H
18 JUL--D
10 AUG--A
18 AUG-B
77. Ans. D.

## Order of clues to be used:

1) Only three persons visit the site between A and $C$.
2) $C$ visits immediately before $G$ and $B$ visits immediately after A.
2 cases:
Case 1: A B _ C G or
Case 2: C G__AB
But case 1 will be eliminated: 3) B visits the site in the month with more than 30 days. Next, we have:
3) Only 2 persons visit the site between G and E .
4) E visits the site before G.

Attempt Now

Case 2: E_C G _ _ A B
Next, we have:
6) E does not visit the site on 18th of any month.
7) There are two persons who visit the site between $F$ and $H$.
8) F visits the site before H and does not visit in the month with 31 days.
9) A does not visit in a month with 30 days and $B$ does not visit the site before or after H.
10) One person visits between $B$ and $D$.

This is our final case which follows all the conditions.
10 FEB--E
18 FEB--F
10 APR--C
18 APR--G
10 JUL--H
18 JUL--D
10 AUG--A
18 AUG-B
78. Ans. A.

Order of clues to be used:

1) Only three persons visit the site between A and $C$.
2) $C$ visits immediately before $G$ and $B$ visits immediately after A.
2 cases:
Case 1: A B _ _ C G or
Case 2: C G __ A B
But case 1 will be eliminated: 3) B visits the site in the month with more than 30 days.
Next, we have:
3) Only 2 persons visit the site between G and E .
4) E visits the site before $G$.

Case 2: E_C G _ _ A B
Next, we have:
6) E does not visit the site on 18th of any month.
7) There are two persons who visit the site between $F$ and $H$.
8) F visits the site before H and does not visit in the month with 31 days.
9) A does not visit in a month with 30 days and $B$ does not visit the site before or after H.
10) One person visits between $B$ and $D$.

This is our final case which follows all the conditions.
10 FEB--E
18 FEB--F
10 APR--C
18 APR--G
10 JUL--H
18 JUL--D
10 AUG--A
79. Ans. A.

As per the question,
Greene > Bolt ( 9.68 sec ) > Powell > Blake ( 9.98 sec ) > Carter > Gatlin
Speed of Greene is greater than Bolt so
100/9.68 i.e $10.33 \mathrm{~m} / \mathrm{sec}$
Hence, $11 \mathrm{~m} / \mathrm{sec}$ is the answer.
80. Ans. B.

As per the question,
Greene > Bolt ( 9.68 sec ) > Powell > Blake
(9.98 sec) > Carter > Gatlin
81. Ans. E.

As per the question,
Greene > Bolt ( 9.68 sec ) > Powell > Blake ( 9.98 sec ) > Carter > Gatlin
Speed of Blake $=100 / 9.98=10.02 \mathrm{~m} / \mathrm{sec}$
So Either Carter or Gatlin has the speed of 9 $\mathrm{m} / \mathrm{sec}$.
82. Ans. D.

Boxes: P, Q, R, S, T, U, V, W and X

1) There are 5 boxes between box $P$ and box
R.
2) Box $T$ is kept immediately above $R$.

| Case-1 | Case-2 |
| :--- | :--- |
|  | T |
| P | R |
|  |  |
|  |  |
|  |  |
|  |  |
| T |  |
| R | P |

3) 3 boxes are kept between box $T$ and box S.

| Case-1.1 | Case-1.2 | Case-2.1 | Case-2.2 |
| :--- | :--- | :--- | :--- |
|  |  | T | S |
| P | P | R |  |
| S |  |  |  |
|  |  |  |  |
|  |  | S | T |
|  |  |  | R |
| T | T |  |  |
| R | R | P |  |
|  |  |  |  |
|  |  |  |  |
|  | S |  |  |
|  |  |  | $P$ |

4) The number of boxes between $P$ and $S$ is same as the number of boxes between $T$ and Q.
5) There are less than 13 boxes kept in the stack.

| Case-1.1 | Case-2.1 (A) | Case-2.1 (B) |
| :--- | :--- | :--- |
|  | Q |  |
|  |  |  |
|  |  |  |
|  | T | T |
| P | R | R |
| S |  |  |
|  |  | Q |
|  | S | S |
| Q |  |  |
| T |  |  |
| R | P |  |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |

(Here case - 2.2 gets eliminated as here we get more than 13 boxes)
(Similarly, case 1.2 gets eliminated as here we get 13 boxes, but we want less than 13 boxes)
6) Box $U$ is kept below box $Q$ but above $P$. (here case - 1.1 will gets eliminated)
7) There is only one box kept between $U$ and V.
(Here case 2.1 (B) will gets eliminated)

8) Box $W$ is kept somewhere above $X$.
9) There are as many boxes kept between $V$ and S as there are between Q and Y (as there is no box kept between V and S therefore there will not be any box between $Q$ and $Y$ )
10) Box $Z$ is kept somewhere above $R$.
11) Box $Y$ is kept below $Q$.

| $Q$ |
| :--- |
| $Y$ |
| $Z$ |
| $T$ |
| $R$ |
| $W$ |
| $U / V$ |
| $S$ |
| $\mathrm{~V} / \mathrm{U}$ |
| X |
| P |

Hence, box W is sixth from the bottom in the given arrangement.
83. Ans. A.

Boxes: P, Q, R, S, T, U, V, W and X

1) There are 5 boxes between box $P \&$ box $R$.
2) Box $T$ is kept immediately above $R$.

| Case-1 | Case-2 |
| :--- | :--- |
|  | T |
| P | R |
|  |  |
|  |  |
|  |  |
|  |  |
| T |  |
| R | P |

3) 3 boxes are kept between box $T$ and box S.

| Case-1.1 | Case-1.2 | Case-2.1 | Case-2.2 |
| :--- | :--- | :--- | :--- |
|  |  | T | S |
| P | P | R |  |
| S |  |  |  |
|  |  |  |  |
|  |  | S | T |
|  |  |  | R |
| T | T |  |  |
| R | R | P |  |
|  |  |  |  |
|  |  |  |  |
|  | S |  |  |
|  |  |  | $P$ |

4) The number of boxes between $P$ and $S$ is same as the number of boxes between $T$ and Q.
5) There are less than 13 boxes kept in the stack.

| Case-1.1 | Case-2.1 (A) | Case-2.1 (B) |
| :--- | :--- | :--- |
|  | Q |  |
|  |  |  |
|  |  |  |
|  | T | T |
| P | R | R |
| S |  | Q |
|  |  | S |
|  | S |  |
| Q |  |  |
| T |  |  |
| R | P |  |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |

(Here case - 2.2 gets eliminated as here we get more than 13 boxes)
(Similarly, case 1.2 gets eliminated as here we get 13 boxes, but we want less than 13 boxes)
6) Box $U$ is kept below box $Q$ but above $P$. (here case - 1.1 will gets eliminated)
7) There is only one box kept between $U$ and V.
(Here case 2.1 (B) will gets eliminated)

8) Box $W$ is kept somewhere above $X$.
9) There are as many boxes kept between V and $S$ as there are between $Q$ and $Y$
(as there is no box kept between V and S therefore there will not be any box between $Q$ and $Y$ )
10) Box $Z$ is kept somewhere above $R$.
11) Box $Y$ is kept below $Q$.

| $\mathbf{Q}$ |
| :--- |
| $\mathbf{Y}$ |
| $\mathbf{Z}$ |
| $T$ |
| $R$ |
| $W$ |
| $\mathrm{U} / \mathrm{V}$ |
| S |
| $\mathrm{V} / \mathrm{U}$ |
| X |
| P |

Hence, U and V are kept immediately above and below box Q .
84. Ans. C.

Boxes: P, Q, R, S, T, U, V, W and X

1) There are 5 boxes between box $P$ and box
R.
2) Box $T$ is kept immediately above $R$.

| Case-1 | Case-2 |
| :--- | :--- |
|  | $T$ |
| $P$ | $R$ |
|  |  |
|  |  |
|  |  |
|  |  |
| $T$ |  |
| $R$ | $P$ |

3) 3 boxes are kept between box $T$ and box S.

| Case-1.1 | Case-1.2 | Case-2.1 | Case-2.2 |
| :--- | :--- | :--- | :--- |
|  |  | T | S |
| P | P | R |  |
| S |  |  |  |
|  |  |  |  |
|  |  | S | T |
|  |  |  | R |
| T | T |  |  |
| R | R | P |  |
|  |  |  |  |
|  |  |  |  |
|  | S |  |  |
|  |  |  | $P$ |

4) The number of boxes between $P$ and $S$ is same as the number of boxes between $T$ and Q.
5) There are less than 13 boxes kept in the stack.

| Case-1.1 | Case-2.1 (A) | Case-2.1 (B) |
| :--- | :--- | :--- |
|  | Q |  |
|  |  |  |
|  |  |  |
|  | T | T |
| P | R | R |
| S |  |  |
|  |  | Q |
|  | S | S |
| Q |  |  |
| T |  |  |
| R | P |  |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |

(Here case - 2.2 gets eliminated as here we get more than 13 boxes)
(Similarly, case 1.2 gets eliminated as here we get 13 boxes, but we want less than 13 boxes)
6) Box $U$ is kept below box $Q$ but above $P$. (here case - 1.1 will gets eliminated)
7) There is only one box kept between $U$ and V.
(Here case 2.1 (B) will gets eliminated)

8) Box $W$ is kept somewhere above $X$.
9) There are as many boxes kept between $V$ and $S$ as there are between $Q$ and $Y$
(as there is no box kept between V and S
therefore there will not be any box between $Q$ and $Y$ )
10) Box $Z$ is kept somewhere above $R$.
11) Box $Y$ is kept below $Q$.


Box $X$ is kept immediately above P. Hence there is no box between $X$ and $P$.
85. Ans. C.

Boxes: P, Q, R, S, T, U, V, W and X

1) There are 5 boxes between box $P$ and box $R$.
2) Box $T$ is kept immediately above $R$.

Attempt Now

| Case-1 | Case-2 |
| :--- | :--- |
|  | T |
| $P$ | $R$ |
|  |  |
|  |  |
|  |  |
|  |  |
| $T$ |  |
| $R$ | $P$ |

3) 3 boxes are kept between box $T$ and box S.

| Case-1.1 | Case-1.2 | Case-2.1 | Case-2.2 |
| :--- | :--- | :--- | :--- |
|  |  | T | S |
| P | P | R |  |
| S |  |  |  |
|  |  |  |  |
|  |  | S | T |
|  |  |  | R |
| T | T |  |  |
| R | R | P |  |
|  |  |  |  |
|  |  |  |  |
|  | S |  |  |
|  |  |  | $P$ |

4) The number of boxes between $P$ and $S$ is same as the number of boxes between $T$ and Q.
5) There are less than 13 boxes kept in the stack.

| Case-1.1 | Case-2.1 (A) | Case-2.1 (B) |
| :--- | :--- | :--- |
|  | Q |  |
|  |  |  |
|  |  |  |
|  | T | T |
| P | R | R |
| S |  |  |
|  |  | Q |
|  | S | S |
| Q |  |  |
| T |  | P |
| R | P |  |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |

(Here case - 2.2 gets eliminated as there will be more than 13 box.)
(Similarly, Case 1.2 gets eliminated as there
will be 13 box not less than 13 box.)
6) Box $U$ is kept below box $Q$ but above $P$. (here case - 1.1 will gets eliminated)
7) There is only one box kept between $U$ and V.
(Here case 2.1 (B) will gets eliminated)

8) Box $W$ is kept somewhere above $X$.
9) As many boxes kept between $V$ and $S$ as many between $Q$ and $Y$.
(as there is no box kept between V and S therefore there will not be any box between $Q$ and $Y$.)
10) Box $Z$ is kept somewhere Above R.
11) Box $Y$ is kept below $Q$.


There are 11 box in the stack.
86. Ans. D.

Boxes: P, Q, R, S, T, U, V, W and X

1) There are 5 boxes between box $P$ and box R.
2) Box $T$ is kept immediately above $R$.

| Case-1 | Case-2 |
| :--- | :--- |
|  | T |
| P | R |
|  |  |
|  |  |
|  |  |
|  |  |
| T |  |
| $R$ | $P$ |

3) 3 boxes are kept between box $T$ and box S.

| Case-1.1 | Case-1.2 | Case-2.1 | Case - 2.2 |
| :--- | :--- | :--- | :--- |
|  |  | T | S |
| P | P | R |  |
| S |  |  |  |
|  |  |  |  |
|  |  | S | T |
|  |  |  | R |
| T | T |  |  |
| R | R | P |  |
|  |  |  |  |
|  |  |  |  |
|  | S |  |  |
|  |  |  | P |

4) The number of boxes between $P$ and $S$ is same as the number of boxes between $T$ and Q.
5) There are less than 13 boxes kept in the stack.

| Case-1.1 | Case-2.1 (A) | Case-2.1 (B) |
| :--- | :--- | :--- |
|  | Q |  |
|  |  |  |
|  |  |  |
|  | T | T |
| P | R | R |
| S |  | Q |
|  |  | S |
|  | S |  |
| Q |  |  |
| R |  |  |
|  |  |  |
|  |  |  |
|  |  |  |
|  |  |  |

(Here case - 2.2 gets eliminated as there will
be more than 13 box.)
(Similarly, Case 1.2 gets eliminated as there will be 13 box not less than 13 box.)
6) Box $U$ is kept below box $Q$ but above $P$. (here case - 1.1 will gets eliminated)
7) There is only one box kept between $U$ and V.
(Here case 2.1 (B) will gets eliminated)

8) Box $W$ is kept somewhere above $X$.
9) As many boxes kept between $V$ and $S$ as many between $Q$ and $Y$.
(as there is no box kept between V and S therefore there will not be any box between $Q$ and $Y$.)
10) Box $Z$ is kept somewhere Above $R$.
11) Box $Y$ is kept below $Q$.

| $\mathbf{Q}$ |
| :--- |
| $\mathbf{Y}$ |
| $\mathbf{Z}$ |
| $T$ |
| $R$ |
| $W$ |
| $U / V$ |
| $S$ |
| $V / U$ |
| $X$ |
| $P$ |

I. Two boxes between T and Q. $\Rightarrow$ True
II. S is kept below W. $\Rightarrow$ True
III. U is kept immediately above P . $\Rightarrow$ False Hence both I and II is true.
87. Ans. C.
$6 m+2 m+5 m=13 m$
Hence, option C.

88. Ans. C.

Point $R$ is south-west of point $P$. Hence, option C.

89. Ans. A.

Point $S$ is west of point $P$. Hence, option A.

90. Ans. A.
(A) is a conclusion. (D) goes against the grain of the passage. (B) applies only to rich students. But (C) is the assumption that underlines the logical reasoning in the passage.
91. Ans. A.

Only course of action I follows. Because the ratio of $1: 17,68$ is so screwed up that immediate steps should be taken to recruit more doctors. Courses of action II and III do not follow. Rolling out incentives to those students who take up medicine would be highly unfair and increasing the number of clinics makes no sense if there are no doctors available. Therefore, option A is the correct answer.
92. Ans. C.

Only III can be inferred. The very name Reuters Institute digital news reports - and the fact that they published a report on the use of social media for news suggests that their reports reveal various insights about digital news consumption. Inferences I and II cannot be deduced because both of them contain a lot of extraneous information that cannot be deduced from what is given. Therefore, option C is the correct answer. 93. Ans. D.

The statement mentions that 'majority of victims might have been nuisance to peace loving people. This implies that majority of the victims are wicked people though some victims are innocent people too. So, both I and II are implicit. Further the statement advocates vehement opposition of wars. So III is implicit.
94. Ans. D.

We have to focus our attention on the conclusion at hand and on larger issues "They need not even be in the not to better IT systems, office at all why?
Because due people can work from elsewhere, as given in (D).
95. Ans. A.
$M \geq G=T \geq B<Q=P<R=S$
From I, $M \geq B$, clearly I is true.

Attempt Now

From II, T<P, we can't compare T and P so II is not true.
Hence, only I is true.
96. Ans. A.
$\mathrm{R}>\mathrm{T}=\mathrm{G}>\mathrm{S}=\mathrm{P} \leq \mathrm{Q}=\mathrm{O}<\mathrm{A} \leq \mathrm{B}$
From I, $\mathrm{P}<\mathrm{A}$, clearly I is true.
From II, G > Q, we can't compare G and Q so II is not true.
Hence, only I is true.
97. Ans. D.
$\mathrm{K}=\mathrm{T}<\mathrm{M}<\mathrm{O}=\mathrm{N}>\mathrm{S}=\mathrm{R}>\mathrm{P} \geq \mathrm{B}$
From I, $\mathrm{K}>\mathrm{O}$, clearly I is not true.
From II, $\mathrm{O}<\mathrm{R}$, clearly $\mathrm{O}>\mathrm{R}$ so II is not true.
Hence, none is true.
98. Ans. D.

Answer cannot be found even using all the three statements
99. Ans. E.

Abhinav's borther>abhinav's
wife>Abhinav>abhinav's father>Abhinav's
sister>abhinav's mother
100. Ans. B.

Combining statement I and III
Floor People

| 6 | $P$ |
| :--- | :--- |
| 5 | $T$ |
| 4 | $R$ |
| 3 | $S$ |
| 2 | $Q$ |
| 1 | $U$ |

101. Ans. B.

Refer to the first paragraph of the passage. It can be clearly inferred that according to gender neutrality, social roles shouldn't be assigned as per the gender of the person and that the term backs the elimination of gender based distinctions.
102. Ans. C.

Refer to the following statement of the passage, "Advocates of post-genderism argue that the presence of gender roles, social stratification, and cogno-physical disparities and differences are generally to the detriment of individuals and society."
'Discrepancies' means differences/ disparities. Inimical means destructive/
harmful. Since the statement says that the post-genderists argue about it, it is clear that it is their cause of concern.
103. Ans. A.

Refer to the following statement of the fourth para, 'Gender-neutral language, genderinclusive language, inclusive language or gender neutrality is a form of linguistic prescriptivism that aims to eliminate (or neutralize) reference to gender in terms that describe people. This can involve discouragement of the use of gender-specific job titles....' and the following line of the sixth para, '"Gender-neutral language" should not be confused with "genderless language", which refers to a language that does not have grammatical gender.'
The former statements validate option A and nullify option $B$. The latter statement nullifies option C.
104. Ans. B.

Refer to the third paragraph of the passage.
It can be inferred that the main reason for it
to be considered a controversial topic is because of the increased number of individuals who identify as transgender, intersex, third sex etc. and that the people are not in a comfortable position to overtly have a discussion over the same.
105. Ans. C.

Refer to the following statement of the passage, "Given the radical potential for advanced assistive reproductive options, postgenderists believe that sex for reproductive purposes will either become obsolete, or that all post-gendered humans will have the ability, if they so choose, to both carry a pregnancy to term and father a child." The correct answer is option C. Option A is nowhere mentioned in the passage.
Option B is an incomplete context.
Option D is illogical and talks about something that is beyond the scope of the passage.
106. Ans. A.

Dispute = conflict, argument
Squabble = a noisy quarrel about something trivial.

Attempt Now

Apostle = a vigorous and pioneering advocate or supporter of a particular policy, idea, or cause.
Concordance $=$ agreement or consistency.
Causatum = effect
Imprint = make an impression or mark on. Hence, option A is the correct answer.
107. Ans. C.

Perspective = a view or prospect.
Dissension = disagreement that leads to discord.
Condemnation = the expression of very
strong disapproval; censure.
Prospect = a view or perspective
Exponent = a person who supports an idea
or theory and tries to persuade people of its truth or benefits.
Sympathy = feelings of pity and sorrow for someone else's misfortune.
Hence, option C is the correct answer. 108. Ans. D.

Transcend = surpass (a person or achievement).
Consonance $=$ agreement or compatibility between opinions or actions.
Initiate =
Bolster = support or strengthen
Outstrip = move faster than and overtake (someone else).
Urge =try earnestly or persistently to
persuade (someone) to do something.
Hence, option D is the correct answer.
109. Ans. E.

Reinforce $=$ strengthen or support (an object
or substance), especially with additional material.
Reciprocity $=$ the practice of exchanging
things with others for mutual benefit, especially privileges granted by one country or organization to another.
Concord = agreement or harmony between people or groups.
Culmination $=$ the highest or climactic point of something, especially as attained after a long time.
Tout $=$ attempt to persuade people of the merits of.
Undermine $=$ lessen the effectiveness, power, or ability of, especially gradually or
insidiously.
Hence, option E is the correct answer. 110. Ans. C.

Stratification $=$ the arrangement or classification of something into different groups.
Denouement = the outcome of a situation, when something is decided or made clear.
Outset = the start or beginning of
something.
Unison = harmony
Cessation = the fact or process of ending or being brought to an end.
Repercussion = an unintended consequence of an event or action, especially an unwelcome one.
Hence, option C is the correct answer.
111. Ans. B.
"Symptom" refers to the physical or mental
feature which is regarded as indicating a condition of disease, particularly such a feature that is apparent to the patient.
"Malleable" means easily influenced; pliable.
"Symptoms" fits in the fits in the first blank as "symptoms" could emerge or start being noticeable. The characteristic of "malleability" allows ease of working on the brain. Thus, option B is the correct answer.
112. Ans. C.
"Detection" refers to the action or process of identifying the presence of something concealed and "subtle" is something so
delicate or precise as to be difficult to analyze or describe. Hence, these are the most appropriate words.
113. Ans. C.

The sentence is about the decision taken by central bank's monetary policy committee that they will give time to the committee decision to see the transitory efforts of demonetization on inflation and the output. The first word should mean that the committee has decided. The second word should be a pronoun for the committee. Being committee a collective noun, pronoun it will be used. The singularity and plurality of the 'it' depends on singularity or plurality of verb. Also, reflexive form of a noun should be used. Therefore, option C is apt. Opted
means making a choice from a range of possibilities. And for the committee, reflexive form of 'it' should be used.
114. Ans. C.

Among all the options, "pace" meaningfully follows the word "grow". "Acknowledging" means to accept, admit, or recognize something. The sentence talks about the acceptance of government of demonetization's impact on consumer spending.
115. Ans. E.

The sentence is about a stereotypical fact that the finance minister has limited resources, thus, he won't be able to provide more investment to different projects or subdepartment but for the first time, he has an extra budget now. The first blank must have a word which means to be controlled, or compel to follow a particular course of action. The second blank must be in accordance with won't and plural form of give. Therefore, Option E is apt. "Constrained" means compelled to follow a particular course of action.
116. Ans. E.

The second blank is followed by the phrase "the end of 2016". Since this is not a fixed time- frame, "at" cannot fit in the blank. This eliminates option D. "Approaching", "near" and "of" would be grammatically incorrect in the blank. This eliminates option A, B, and C. This leaves us with option $E$, which is the correct answer.
117. Ans. A.
"Revenue" refers to income, especially when of an organization and of a substantial nature and "demographic" means a statistic characterizing human populations. Hence, these are the most appropriate words. 118. Ans. D.

The sentence is about the efficiency of amazon. The first blank must have a word that shows possibility in a positive tone. The second blank must have a word that shows easiness to use the portal. Therefore, option D is apt. 'Perhaps' is used to express uncertainty or possibility. 'Simplify' refers to
make something simpler or easier to do or understand.

## 119. Ans. D.

The latter part of the sentence talks about some action that has been made possible by internet which helps people to speak out their minds. Logically, the only word that fits in the blank is anonymity which is the condition of being anonymous i.e. (of a person) not identified by name; of unknown name.
Folio refers to an individual leaf of paper. Epoch refers to a particular period of time in history or in a person's life Apprehensions mean doubt.
Conviction means a firmly held belief. Rapidness refers to the fastness of something.
Nuances refer to a slight difference in meaning, expression, or sound.
Exploring the options via their meaning, the first blank can be filled in by the word nuances.
Thus, D is the correct option. 120. Ans. C.

It can be concluded from the statement that the portrayal of women in video games is inappropriate and unreasonable. Therefore, 'absurdity' best fits the first blank.
'Exhibiting' fits the second blank as it means displaying. So option 3 is the correct answer.
Felony - crime
Enticing- tempting
Transgression- crime
Tantalizing- teasing
Malfeasance- wrongdoing
Enthralling- fascinating
121. Ans. D.

Refer to the last question of the series.
122. Ans. A.

Refer to the last question of the series.
123. Ans. A.

Refer to the last question of the series.
124. Ans. B.

Refer to the last question of the series.
125. Ans. C.

Correct Sequence: FECABD
The central theme of all the passage is the threat of rising sea level in Kolkata and

Mumbai as reported by a US-based organization. hence sentence $F$ is the opening sentence of this series.
Sentence E and C from a pair since both talk about the steps taken to prohibit and mitigate the situation of waterlogging. In this case, the statement of the mayor should be followed by the steps taken by the civil body. The mayor is a part of the civic body. Sentence A and B form a pair as both of them talk about the reasons that lead to waterlogging in Kolkata. B will come after A because of the use of the word 'more' in it, adding to the poor conditions with respect to waterlogging.
Placing sentences $A B$ before EC makes the structure not very convincing on grammatical and logical grounds. Thus, EC should be followed by AB.
Statement D stands independently as it talks about a redeeming factor for Kolkata in light of the existence of wetlands in the eastern side, and should come last in the series. It has no direct linkage to any of the other statements with respect to the reasons for waterlogging or the steps taken to control them.
126. Ans. E.

The above sentence is grammatically correct. 127. Ans. A.

The error lies in the incorrect usage of a pronoun. Instead of "this", 'these' should be used; 'this' is used to describe a singular countable noun and "these" is used with plural countable nouns. A non-countable noun has no plural form. In the above sentence, "philosophers" is plural, and 'these' is the pronoun that should be used. Hence, option A is correct.
128. Ans. D.

The error lies with the incorrect usage of a pronoun. 'Whom' is the object of a verb (i.e. the one being acted upon). The difference between 'who' and 'whom' is similar to that between 'he' and 'him'. 'He' is the subject of the verb, and 'him' is an object. Similarly, 'who' is the subjective pronoun and the sentence demands the subjective pronoun
and not objective pronoun.
Hence, D is correct.
129. Ans. B.

The error lies in the incorrect usage of the pronoun. The words 'there' and 'their' are often confused and misused because they are homophones i.e., they sound alike. 'There' refers to a place; while "their" means belonging to, or associated with, a group of people. The sentence demands a possessive known as it shows belonging; so, there" should be used here. Hence, option B is correct.
130. Ans. D.

The error lies in the incorrect usage of the tense in part D. "Has" indicate singular subject" and "have" indicates plural subjects. Since we have two subjects joined by the conjunction "and", the plural verb must be used. Thus, "has been" should be replaced by "have been" to make the sentence correct. 131. Ans. C.

The error lies in the incorrect usage of 'which' in the third part of the sentence. Here we need to use the conjunction "that" to state what was unacceptable. "Which" makes the sentence grammatically incorrect. 132. Ans. B.

The error lies in the incorrect usage of a preposition. Instead of 'point for', it should be 'point with' as the sentence reflects the association. The idea here is to provide the point with elegance, which is correct this way and not otherwise.
Hence, option B is correct.
133. Ans. C.

The error lies in the incorrect usage of the verb. "Have been" is a verb used to form the present perfect tense, and when followed by a present participle, such as "running", "walking", "doing" etc., the present perfect continuous tense. "Had been" basically follows similar parameters, but for the past perfect continuous tense instead of present perfect. In this case, "had" doesn't change depending on the subject, whether it is singular or plural.
Hence, C is correct.
134. Ans. A.

The error lies in the incorrect usage of an adverb. The main difference between these two words is that "however" can stand by itself at the beginning of a sentence, with a comma after it, while "although" can't do this. The words also have slightly different meanings - "although" means "in spite of the fact that", while "however" means "but". The above segment requires the usage of "however" and not "although". Hence, A is correct.
135. Ans. B.

The error lies in the incorrect usage of the preposition. The preposition "by" is used when the dependent clause starts with a verb, while "with" is used when the dependent clause starts with a noun. Hence, B is correct.
136. Ans. E.

The sentence is grammatically correct. Hence, E is correct.
137. Ans. A.

The sentence implies that the concerned persons cleaned their house before their parents came back home.
The phrase 'straighten up' means 'to make (something) organized or tidy'.
Therefore, option A is the correct answer. 138. Ans. C.

The phrase 'require considerably' is incorrect. We use base form of the verb after modals. Therefore, 'required' must be replaced with 'require'.
Also, an adjective is required to modify the gerund form of the word 'maneuvering'. Hence, 'considerably' must be replaced by 'considerable' to form a grammatically correct sentence.
Hence, option C is the correct answer. 139. Ans. E.

The sentence is both contextually and grammatically correct, hence, no correction is required.
Therefore, option E is the correct answer. 140. Ans. B.

The sentence is an example of third conditional sentences.

Third conditional sentences are used to explain that present circumstances would be different if something different had happened in the past.
When using the third conditional, we use the past perfect (i.e., had + past participle) in the if-clause. The modal auxiliary (would, could, should, etc.) + have + past participle in the main clause expresses the theoretical situation that could have happened.
Therefore, 'have seen' must be replaced by 'had seen' to form a grammatically correct sentence.
Hence, option B is the correct answer.
141. Ans. D.

The sentence implies that the person's plan to trek through South America failed when he got sick.
If something that has been planned or agreed falls through, it does not happen i.e. the phrase 'fall through' means 'to fail'. Hence, 'fell upon' must be replaced with 'fell
through' to form a grammatically correct sentence.
Therefore, option $\mathbf{D}$ is the correct answer. 142. Ans. A.

The given sentence violates parallelism. Parallel structure is the repetition of a chosen grammatical form within a sentence. When we compare items in a list, we use parallel structure.
In the given sentence, adjectives are used to modify 'public schools' while 'funded by the government' is a phrasal verb. It needs to be replaced by some adjective. 'Government-
funded' is the appropriate adjective to maintain the parallelism.
Hence, option $\mathbf{A}$ is the correct answer. 143. Ans. C.

We use past perfect tense to talk about something that happened before another action in the past, which is usually expressed by the simple past.
In the given sentence, the subjects were not able to stay overnight at the hotel because they had not made reservations before.
Therefore, the phrase in the bold should be in the past perfect tense.
Hence, option C is the correct answer.
144. Ans. A.

The given sentence talks about the activities happened in the past. The emboldened phrase violates the parallelism of the sentence. The phrase should be in past continuous tense.
When we use the past continuous with two actions in the same sentence, it expresses the idea that both actions were happening at the same time. The actions are parallel. Therefore, the phrase should be 'was not paying attention'.
Hence, option $\mathbf{A}$ is the correct answer. 145. Ans. E.

The given sentence is both grammatically and contextually correct. "Unpardonably" is an adverb which correctly modifies the verb "neglected".
Hence, option $\mathbf{E}$ is the correct answer. 146. Ans. E.

According to the second paragraph of the passage, "smart city" is a designation given to a city that incorporates information and communication technologies (ICT) to enhance the quality and performance of urban services such as energy, transportation and utilities in order to reduce resource consumption, wastage and overall costs.
In the passage, there is no mention of what 'smart' means in Smart Cities. Option B makes sense, but it is not mentioned in the passage.
Therefore, option E is the apt answer. 147. Ans. D.

Option A: The report was on the Smart Cities Mission, not on slum-free or cities without slum. The statement can't be deciphered from the passage.
Option B: The passage states that 'the Housing and Land Rights Network (HRLN) on the Smart Cities Mission poses the question: "Smart for whom?"..' Retort means to say something in answer to a remark, typically in a sharp, angry, or witty manner. So, the statement is the opposite of what mentioned in the passage.
Option C: One cannot say or decipher, 'the Smart Cities Mission seeks to cover nearly 10
crore population in 100 cities,' from the paragraph.
Option D: It can be deciphered from the first and the last paragraphs.
Option E: The correct sentence is '...At least
six homes are destroyed and 30 people
forcibly evicted each hour in India as
authorities modernise cities and build highways.'
Therefore, option $D$ is the apt answer. 148. Ans. B.

We can decipher all the statements from the third paragraph except statement B. The paragraph states '..It seems difficult for the planners to realise that since the beginning of the last century, despite the spectacular growth of urban populations, the poorest half of the world has received just $1 \%$ of the total increase in global wealth.' It might be conveying the sense that global wealth inequality has been high and rising. But 'despite the spectacular growth of urban populations, global wealth inequality has certainly been high and rising' makes no sense. Therefore, option B is the apt answer. 149. Ans. E.

Option I: From the second paragraph, one can decipher that focus of the mission is economic growth. But the first paragraph states that 'without taking into account the paucity of formal housing that cities offer,' it is exercising forced evictions and demolitions of homes, slums in particular. How can this contribute to the economic growth? So, one can say that the smart city proposal is perpetuating the very issue that they aim to solve.
Options II, III and IV can be deciphered from the fourth paragraph, thereby all options can be used.
Therefore, option E is the apt answer. 150. Ans. B.

Option I: The passage states '..The three main mechanisms have been adopted to produce space-infrastructure and megaprojects, redevelopment, and creating exception regimes for "slums" are applicable to the implementation of the Mission.' This means that the Smart Cities Mission uses
these mechanisms as their mechanisms for the implementation of the mission. Hence, option I can be inferred.
Option II: From the fourth paragraph, one can clearly state that the statement is clearly mentioned in the passage, not inferred from the passage.
Option III: The passage states, '..Over the last two decades, the state-led production of space, as part of worlding cities, has introduced new structural violence into the lives of poor groups.' 'Worlding cities' refers to urbanisation. Hence, option III can be inferred.
Therefore, option B is the apt answer. 151. Ans. B.

Immediate Payment Service (IMPS) is an instant interbank electronic fund transfer service through mobile phones.
152. Ans. D.

2020 Summer Olympics will be held in Tokyo, Japan.

- The games are planned to be held from 24 July to 9 August 2020 in Tokyo.
- The city was announced as the host at the 125th IOC Session in Buenos Aires on 7 September 2013. Having previously hosted the 1964 Summer Olympics, Tokyo will become the first city in Asia to host the Olympics twice.

153. Ans. E.

Manama is the capital and Bahraini dinar is the currency of Bahrain.
154. Ans. B.

Indira Sagar Dam is located on Narmada. This is the world's largest river valley plan. 155. Ans. E.

Mobile Money Identifier or MMID is a 7 digit
number of a bank customer. This number is used when you try to send or receive money using the IMPS method. Every bank account has only one MMID. This MMID would be unique to the bank account. Along with the mobile number, MMID identifies a bank account.
156. Ans. D.

Udaan is a Special Industry Initiative for
Jammu \& Kashmir in the nature of the
partnership between the corporates of India
and Ministry of Home Affairs and implemented by National Skill Development Corporation.
The programme aims to provide skills training and enhance the employability of unemployed youth of J\&K. The Scheme covers graduates, postgraduates and threeyear engineering diploma holders

## It has two objectives :

(i) To provide an exposure to the unemployed graduates to the best of Corporate India
(ii) To provide Corporate India, an exposure
to the rich talent pool available in the State 157. Ans. B.

To promote cashless transaction among people, India's first Digi Dhan Mela held in Gurugram, Haryana.
158. Ans. C.

Stand-Up India Scheme Facilitates bank loans between Rs 10 lakh and Rs 1
Crore to at least one Scheduled Caste (SC) or Scheduled Tribe (ST) borrower and at least one-woman borrower per bank branch for setting up a Greenfield enterprise.
This enterprise may be in manufacturing, services or the trading sector. In the case of non-individual enterprises, at least 51\% of the shareholding and controlling stake should be held by either an SC/ST or woman entrepreneur.
159. Ans. C.

The National Science Day is observed every year on 28th February with an objective to spread message of importance of science and its application among the people. The theme for National Science Day 2018 is "Science and Technology for a sustainable future." 160. Ans. B.

Namdhapa National Park is the largest protected area in the Eastern Himalaya biodiversity hotspot and is located in Arunachal Pradesh in North East India. It is also the largest national park in India in terms of area.
161. Ans. B.

Regional Rural Banks were started in 1975
due to the fact that even after
nationalization, there were cultural issues
which made it difficult for commercial banks, even under government ownership, to lend to farmers. Each RRB is owned by three entities with their respective shares as follows:
Central Government $\rightarrow 50 \%$
State government $\rightarrow 15 \%$
Sponsor bank $\rightarrow 35 \%$
162. Ans. A.

The 17th edition of the FIFA under-17
World Cup football tournament 2017 was hosted by India.
Note:-This was the first time India hosted an international football competition.
The 17th FIFA U-17 World Cup, a biennial international football tournament contested by men's under-17 national teams.
England won the $\mathbf{U - 1 7}$ World Cup for the first time after coming back from a two-goal deficit and beating Spain 5-2in the final. 163. Ans. E.

The mobile banking app "LIME" has been launched by Axis Bank. The app will allow customers in both account and non-account holders to compare and shop, split bills, transfer money and even share their mobile banking wallets. This app can also be used to pool money to buy gifts or for group travel by friends.
164. Ans. A.

PM Narendra Modi inaugurated India's first International Exchange, 'India INX' in Gandhinagar. It is a wholly owned subsidiary of BSE (Bombay Stock Exchange). 165. Ans. B.

The Heads of State or Government welcomed the offer of the Republic of Azerbaijan to host the XVIII Summit of the Heads of State or Government of the Non-Aligned Movement in 2019, as endorsed by the NAM Member States from the European Region, and recommended it for endorsement to the XVII NAM Summit to be held in Margarita Island, the Bolivarian Republic of Venezuela on 17-
18 September 2016.
166. Ans. D.

The Reserve Bank of India launched Sachet portal, sachet.rbi.org.in, to check illegal money collection on $4^{\text {th }}$ August 2016. The
portal will help anyone can obtain information regarding entities that are allowed to accept deposits, lodge complaints and share information.
167. Ans. C.

Ranbir Kapoor has won the Best Actor in A Leading Role award at the 2019 Filmfare Awards.
Filmfare awards are presented annually in the Hindi language film industry of India. The awards are presented to honour both artistic and technical excellence.
168. Ans. C.

The M. Chinnaswamy Stadium is one of the premier cricket stadiums of India. It is
located in the heart of the city of Bengaluru, Karnataka. It can accommodate
approximately 40000 spectators during a match.
169. Ans. A.

The Government of India has set up Shri Justice M. B. Shah Commission of Inquiry for Illegal Mining of Iron Ore and Manganese vide Notification dated 22nd November, 2010.
170. Ans. A.

According to Census 2011, Bihar's population density is the highest of 1,106 per sq. Km. 171. Ans. D.

Indian Navy's first indigenous Scorpeneclass stealth submarine INS Kalvari, has recently launched for the first sea trial in the Mumbai naval dockyard.
Note: It is a diesel-electric attack submarine which is built by Mazagon Dock Limited (MDL) in collaboration with French naval defence and energy company DCNS under Project 75 in Mumbai, Maharashtra. 172. Ans. D.

The consumer movement marks 15th March with World Consumer Rights Day every year, as a means of raising global awareness about consumer rights and needs.
Celebrating the day is a chance to demand that the rights of all consumers are respected and protected, and to protest against market abuses and social injustices which undermine those rights.

World Consumer Rights Day was inspired by President John F Kennedy, who sent a special message to the US Congress on 15th March 1962, in which he formally addressed the issue of consumer rights. The consumer movement first marked that date in 1983 and now uses the day every year to mobilise action on important issues and campaigns.
173. Ans. B.

Equated Monthly Installment (EMI) is the monthly payment a borrower makes on his loan. EMI's are used to pay off both interest and principle each month.
174. Ans. D.

Achanta Sharath Kamal is a professional table tennis player from Tamil Nadu, India. He is the first Indian table tennis player ever to become nine times Senior National Champion hence breaking the record of eight times National Champion Kamlesh Mehta. Recently he received the fourth highest civilian award, Padma Shri.
175. Ans. A.

Export-Import Bank of India (EXIM) bank is headquartered in Mumbai. It is the premier export finance institution in India, and has been established in 1982 under Export-Import Bank of India Act 1981
176. Ans. B.

Chief Minister of Andhra Pradesh launched a medical scheme known as Arogya Raksha for families who are above poverty line. It involves a payment of Rs 1200 premium annually and avail free medical treatment for diseases under secondary and tertiary care in both government and private hospitals.
177. Ans. C.

Pradhan Mantri Jan Dhan Yojana is a full fledge financial programme started by the government that explains that every individual should have a bank account that will include life insurance of account. The idea of Pradhan Mantri Jan Dhan Yojana is to encourage financial inclusion in the nation, so this seems that option C is correct. Options A, B and D are incorrect as Pradhan Mantri Jan Dhan Yojana is not related to any housing loan or promotion of women's group
and not involved in financial help to lower communities.
178. Ans. B.

The Vyas Samman is given in literature field in India, first awarded in 1991. It is awarded annually by the K.K. Birla

## Foundation.

179. Ans. B.

Chhabra Thermal Power Plant is one of Rajasthan's coal-fired power plants. It is located at Chowki Motipura (Village) of tehsil Chhabra in Rajasthan's Baran district. 180. Ans. D.

Indian Financial System Code (IFS Code) is an alphanumeric code that uniquely identifies a bank-branch participating in the two main Electronic Funds Settlement Systems in India:
-The Real Time Gross Settlement (RTGS)
-The National Electronic Funds Transfer (NEFT) Systems.
This is an 11-character code with the first four alphabetic characters representing the bank name, and the last six characters (usually numeric, but can be alphabetic) representing the branch.
181. Ans. B.

Minors above the age of 10 years and who can sign uniformly. This account will be opened in the sole name of the minor. 182. Ans. C.

* Food and Agriculture organisation (FAO) Council has approved the proposal of India to observe an International Year of Millets in 2023.
* This proposal has been approved at the 160th session of the Food and Agriculture Organisation (FAO) Council being held in Rome. Millets consists of jowar, bajra, ragi and minor millets together termed as nutricereals.
* This proposal will enhance global awareness to bring back these nutri-cereals to the plate, for food and nutrition security.

183. Ans. A.

Ministry of Housing and Urban Affairs (MoHUA) has partnered with Microsoft India to use the platform Project Sangam of Microsoft on its Swachh Bharat e-Learning Portal.
184. Ans. B.

Dormant means inactive and inoperative means which is not being operated i.e. no transactions have been undertaken recently. In terms of RBI guidelines "A savings as well as current account should be treated as inoperative/dormant if there are no transactions in the account for over a period of two years".
185. Ans. B.

The Federal Bank Limited is a major Indian commercial bank in the private sector. Its headquarter is in Aluva in the district of Kochi, Kerala.
186. Ans. D.

The theme of 106th edition Indian Science Congress-2019 is 'Future India: Science and Technology'.

- Prime Minister Narendra Modi inaugurated the Indian Science Congress-2019 (106th edition) in Jalandhar, Punjab.
- Indian Science Congress Association (ISCA) is a premier scientific organisation of India with headquarters at Kolkata, West Bengal.
- It has a membership of more than 30,000 scientists.
Note:
- The 105th Indian Science Congress-2018 was held in Imphal, Manipur University.
- Theme - Reaching the unreached through science and technology.

187. Ans. E.

* Renowned harmonium player Pandit

Tulsidas Borkar(84-year) passed away in Mumbai.

* Borkar was conferred the Padma Shri in 2016 for his contributions to Indian music.
* He was also a recipient of the Sangeet Natak Akademi Award.

188. Ans. D.

SMERA Ratings Ltd (SMERA) is a full service credit rating agency exclusively set up for micro, small and medium enterprises (MSME) in India and has grown to rate SME, mid \& large corporate. It provides ratings which enable MSME, SMEs, Corporates to raise bank loans at competitive rates of interest.
189. Ans. B.

The headquarter of International Atomic Energy Agency is located in Vienna, Austria. Note: It is an international organization that seeks to promote the peaceful use of nuclear energy. It was established on 29 July 1957. 190. Ans. B.

- India's first indigenous, long-range artillery gun is known as - Dhanush.
- Dhanush is a $155 \mathrm{~mm} \times 45 \mathrm{~mm}$ calibre artillery gun and is also called the "desi Bofors".
- It was manufactured by the Jabalpur-based Gun Carriage Factory (GCF).

191. Ans. E.

- Capital Adequacy Ratio is the measure of a bank's financial strength expressed by the ratio of its capital (net worth and subordinated debt) to its risk-weighted credit exposure (loans). It is also called CRARCapital to Risk-weighted Assets Ratio.
- A bank with a higher capital adequacy is considered safer because if its loans go bad, it can make up for it from its net worth. Most banks in India have a capital adequacy of more than 12\%.

192. Ans. B.

The Achanakmar Wildlife Sanctuary is an Indian sanctuary in Mungeli district, Chhattisgarh State.
193. Ans. D.

Bharat Bill Payment System (BBPS) is an integrated bill payment system that will enable payment services online or through an offline network.
Payment can be made through multiple modes and the users will get instant confirmation.
It offers bill payment services to consumers through the network of agents/retail shops/bank-branches and digital channels like - Internet banking of banks, Mobile app of banks etc. allowing multiple payment modes like Card, UPI, AePS, Wallet, Cash and provides instant confirmation. It will facilitate a less cash society through migration of bill payments from cash to electronic channel.
194. Ans. C.

Dr. Mohammad Shtayyeh (60-years) has been appointed the new Prime Minister of Palestinian.
Mr. Shtayyeh is an economist with a PhD from the University of Sussex in England. 195. Ans. E.

Former Vice President Hamid Ansari has launched the new book of P Chidambaram (former Finance Minister) named "Undaunted: Saving the Idea of India" at Nehru Memorial Museum in New Delhi. The book is a collection of essays on the country's atmosphere of fear and how the constitutional values are being threatened. 196. Ans. E.

USSD - Unstructured Supplementary
Services Data
USSD (Unstructured Supplementary Service Data) is a Global System for Mobile(GSM) communication technology that is used to send text between a mobile phone and an application program in the network. Applications may include prepaid roaming or mobile chatting.
197. Ans. D.

The Himachal Pradesh Assembly on $16^{\text {th }}$ Feb 2019 passed a Bill to make Sanskrit the second official language of the state.

- Irrigation and Public Health Minister Mahender Singh Thakur introduced the Himachal Pradesh Official Language Bill, 2019 (Amendment) in the ongoing budget session.
- This bill was passed without any discussion.
- The first official language of Himachal Pradesh is hindi.
- Himachal Pradesh was coined from the Sanskrit words 'him' means 'snow' and achal means 'land' or 'abode' by Acharya Diwakar Datt Sharma, one of the state's eminent Sanskrit scholars. 198. Ans. A.

BJP leader Pramod Sawant (46-years) was sworn-in as the new Chief Minister (11th) of Goa.
He succeeded Manohar Parrikar, who died after a prolonged battle with advanced pancreatic cancer.
199. Ans. B.

The primary product of PM Narendra Modi's Pradhan Mantri MUDRA Yojana will be providing refinance for lending to micro businesses/units (medium and small entrepreneurs). The initial products and schemes under this umbrella have already been created and the interventions have been named 'Shishu', 'Kishor' and 'Tarun' to signify the stage of growth / development and funding needs of the beneficiary micro unit / entrepreneur as also provide a reference point for the next phase of graduation / growth for the entrepreneur to aspire for:

1. Shishu: covering loans up to Rs 50,000
2. Kishor: covering loans above Rs 50,000 and up to Rs. 5 lakh
3. Tarun: covering loans above Rs 5 lakh and up to Rs. 10 lakh 200. Ans. B.

Indian squash player Ramit Tandon has won the 2019 Seattle Open title by defeating Mohamed El Sherbini of Egypt in the final in the USA.

