



KD Campus Pvt. Ltd

PLOT NO. 2 SSI, OPP METRO PILLAR 150, GT KARNAL ROAD, JAHANGIRPURI DELHI: 110033

RPF MOCK TEST – 6 (SOLUTION)

51. (B) Let the age of elder person = x years
and, the age of younger person
= $(x - 18)$ years

ATQ,

$$(x - 8) = 4(x - 18 - 8)$$

$$\Rightarrow x - 8 = 4x - 104$$

$$\Rightarrow 3x = 96$$

$$\Rightarrow x = 32$$

$$\therefore \text{Required sum} = 32 + (32 - 18) = 46 \text{ years}$$

52. (A) A.T.Q.

$$\text{Perimeter of the park} = 15 \times \frac{6}{60} = \frac{3}{2}$$

$$= 1500 \text{ m}$$

Now,

$$2(4x + x) = 1500$$

$$\Rightarrow x = \frac{1500}{10} = 150$$

$$\therefore \text{Area of park} = 4x \times x = 4x^2$$

$$= 4 \times 150 \times 150$$

$$= 90000 \text{ m}^2$$

53. (C) Length of the longest rod

$$= \sqrt{120^2 + 60^2 + 40^2}$$

$$= \sqrt{14400 + 3600 + 1600}$$

$$= 140 \text{ cm}$$

54. (A) Let the speed of the stream = x km/hr
A.T.Q.,

$$\frac{22}{18+x} + \frac{22}{18-x} = \frac{11}{4}$$

$$\Rightarrow \frac{18-x+18+x}{324-18x+18x-x^2} = \frac{1}{8}$$

$$\Rightarrow 228 = 324 - x^2$$

$$\Rightarrow x = 6$$

55. (C) A.T.Q.,

$$\frac{4 \times 0.30 - 3 \times 0.500}{0.003}$$

$$= \frac{1.20 - 1.500}{0.003} = \frac{-0.3}{0.003} = -100$$

56. (A) A.T.Q.,

They will met after = LCM of

$$\left(\frac{13}{4}, \frac{13}{6.5}, \frac{13}{9}\right) = 26$$

\therefore Round completed by second person

$$= \frac{26 \times 6.5}{13} = 13$$

57. (A) Let $a = 18$, $b = 12$ and $c = 16$

$$\text{Now, } ab + a + b = 246$$

$$\text{Then, } 18 \times 12 + 18 + 12 = 246 \text{ (satisfy)}$$

$$\text{and, } ac + a + c = 322$$

$$18 \times 16 + 18 + 16 = 322 \text{ (satisfy)}$$

$$\text{and, } bc + b + c = 220$$

$$12 \times 16 + 12 + 16 = 220 \text{ (satisfy)}$$

$$\therefore a + b + c = 18 + 16 + 12 = 46$$

58. (B) Let the work done by 1 man in 1 days
= 1 unit

$$\therefore \text{Total work} = 1 + 2 + 3 + 4 \dots\dots\dots + 13$$

$$= 91$$

$$\therefore \text{Required number of days} = \frac{91}{8}$$

$$= 11 \frac{3}{8}$$

59. (C) Total number of ways

$$= 4 \times 3 \times 2 \times 3 = 72$$

60. (D) Taking option (D)

$$145 \Rightarrow 1 + 4! + 5! = 1 + 24 + 120 = 145$$

61. (B) A.T.Q.,

$$15 = 3 \times 5$$

$$20 = 2 \times 2 \times 5$$

$$\text{LCM of 15 and 20} = 60$$

$$\text{and, } 60 \times 3 = 180$$

$$\text{So, number can be} = 3 \times 3, 3 \times 3 \times 5, 3 \times 3 \times 5 \times 2, 3 \times 3 \times 5 \times 2 \times 2.$$

62. (D) ATQ,

$$\frac{1}{p} + \frac{1}{q} = \frac{1}{p+q}$$

$$\Rightarrow \frac{p+q}{pq} = \frac{1}{p+q}$$

$$\Rightarrow (p+q)^2 = pq$$

$$\Rightarrow p^2 + q^2 + 2pq = pq$$

$$\Rightarrow p^2 + q^2 + pq = 0$$

$$\& p^3 - q^3 = (p-q)(p^2 + q^2 + pq)$$

$$\therefore p^3 - q^3 = 0$$

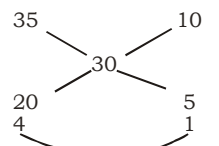
63. (C) $x^2 - y^2 + 10xz + 10yz$

$$= (x-y)(x+y) + 10z(x+y)$$

$$= 0 + 10 \times 94 (93 + 93)$$

$$= 174840$$

64. (C) Passed Failed



$$5 \text{ units} = 100$$

$$4 \text{ units} = 80$$

\therefore Number of passed candidates = 80

81. (A) ATQ,

$$\text{C.I.} \rightarrow 24000 \left(1 + \frac{5}{100}\right)^3 - 24000$$

$$= 27783 - 240000$$

$$= ₹ 3783$$
82. (B) Required Percentage

$$= \frac{(80+60+60) - (90+70)}{(90+70)} \times 100$$

$$= \frac{200 - 160}{100} \times 100$$

$$= \frac{40}{160} \times 100 = 25\%$$
83. (B) $\frac{105}{540} \times 360^\circ = 70^\circ$
 So, we can say that he scored 105 marks is obtained in Hindi.
84. (A) Science - English
 $= 80^\circ - 60^\circ$
 $= 20^\circ$
 Difference between Mathematics and Hindi is equal to difference between Science and English.
85. (C) Required marks

$$= \frac{(90^\circ + 70^\circ) - (60^\circ + 60^\circ)}{360^\circ} \times 540$$

$$= \frac{40^\circ}{360^\circ} \times 540^\circ = 60$$
86. (C) As, Daggles is poor writing.
 Similarly, **Stammering** is speech defect.
87. (B) As, $M \ a \ R \ C \ h \ I \ b \ s \ Z \ n$

 Similarly,
 $A \ p \ R \ I \ l \ M \ h \ s \ O \ b$
88. (D) As, $35 - 12 \Rightarrow 7 \times 5 - (7 + 5)$
 Similarly, $143 - 24 \Rightarrow 11 \times 13 - (11 + 13)$
89. (B) As, $\frac{6 \times 6 \times 6}{2} = 108$
 Similarly, $\frac{8 \times 8 \times 8}{2} = 256$
90. (C) As, $\frac{10 + 4}{2} = 7$
 Similarly, $\frac{26 + 4}{2} = 15$

91. (A) **Parliament** is composed of all other three.
92. (D) Except **Deer - Bleat**, in all other pairs, second is the noise produced by first.
93. (D) Except **264**, in all others middle digit is the product of other two digits.
94. (C) Except **20 - 80**, in all others, first number $\times 3.5 =$ second number
95. (D)
96. (B)
97. (A) As, $\frac{16}{4} = \frac{32}{8} = 4$
 And, $\frac{8}{4} = \frac{4}{2} = 2$
 Similarly, $\frac{27}{9} = \frac{12}{4} = 3$
98. (C) Misplacement
99. (D)
100. (A)

Tuesday	Wednesday	Thursday	Friday	Saturday
मंगलवार	बुधवार	बृहस्पतिवार	शुक्रवार	शनिवार
A	D	B	E	C
101. (D) From figure,
- \therefore will be formed by folding the question figure.

KD Campus KD Campus Pvt. Ltd

PLOT NO. 2 SSI, OPP METRO PILLAR 150, GT KARNAL ROAD, JAHANGIRPURI DELHI: 110033

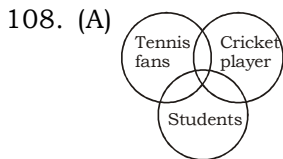
102. (C)

103. (B)

104. (C) $6, 16, 46, 136, 406$
 $\times 3-2 \quad \times 3-2 \quad \times 3-2 \quad \times 3-2$

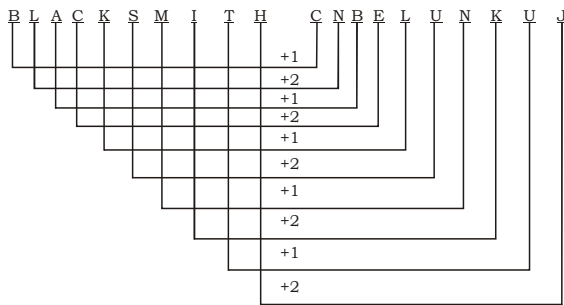
105. (B) $24, 71, 132, 209, 304$
 $+47 \quad +61 \quad +77 \quad +95$
 $+14 \quad +16 \quad +18$
 $+2 \quad +2$

106. (A) Satya's birthday was on **Friday**.

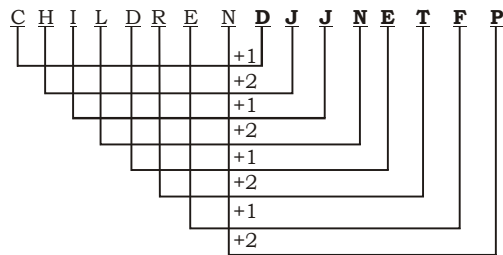


109. (A) **gfeii/gfeii/gfeii/gfeii**

110. (B) As,



Similarly,



111. (D) As, $2895 \Rightarrow (17)^{25}$

$3245 \Rightarrow (18)^{25}$

and, $3615 \Rightarrow (19)^{25}$

Similarly, **$5295 \Rightarrow (23)^{25}$**

112. (C) $5 \div 3 - 25 \div 20 = 20 \times 30$

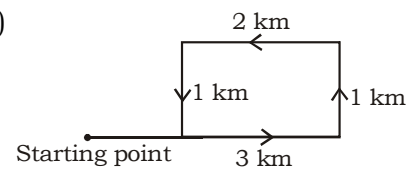
After changing the signs,

$5 \times 3 + 25 - 20 \div 20 = 39$

$\Rightarrow 15 + 25 - 1 = 39$

$\Rightarrow \mathbf{39 = 39}$

113. (A)



\therefore He is **1 km** away from the starting point.

114. (B)

115. (D)

116. (D) Right $\overline{\text{Q P O N M}}$ Left

117. (C)

118. (A) Required order-

C, M, E, C, M, P, **E**, P, P, C

119. (C)

120. (D) N E A T

$\downarrow \quad \downarrow \quad \downarrow \quad \downarrow$

32, 21, 41, 68

Answer key

1. (A)	16. (B)	31. (A)	46. (A)	61. (B)	76. (B)	91. (A)	106. (A)
2. (B)	17. (B)	32. (C)	47. (C)	62. (D)	77. (C)	92. (D)	108. (A)
3. (B)	18. (D)	33. (C)	48. (B)	63. (C)	78. (C)	93. (D)	109. (A)
4. (C)	19. (C)	34. (C)	49. (B)	64. (C)	79. (A)	94. (C)	110. (B)
5. (A)	20. (C)	35. (A)	50. (B)	65. (C)	80. (B)	95. (D)	111. (D)
6. (D)	21. (D)	36. (B)	51. (B)	66. (D)	81. (A)	96. (B)	112. (C)
7. (A)	22. (C)	37. (A)	52. (A)	67. (D)	82. (B)	97. (A)	113. (A)
8. (B)	23. (B)	38. (A)	53. (C)	68. (D)	83. (B)	98. (C)	114. (B)
9. (B)	24. (A)	39. (C)	54. (A)	69. (C)	84. (A)	99. (D)	115. (D)
10. (C)	25. (-)	40. (-)	55. (C)	70. (A)	85. (C)	100. (A)	116. (D)
11. (C)	26. (A)	41. (D)	56. (A)	71. (B)	86. (C)	101. (D)	117. (C)
12. (D)	27. (C)	42. (B)	57. (A)	72. (C)	87. (B)	102. (C)	118. (A)
13. (C)	28. (A)	43. (C)	58. (B)	73. (C)	88. (D)	103. (B)	119. (C)
14. (B)	29. (C)	44. (B)	59. (C)	74. (B)	89. (B)	104. (C)	120. (D)
15. (C)	30. (A)	45. (B)	60. (D)	75. (C)	90. (C)	105. (B)	