IBPS PO Preliminary Grand Test –IPP-180933

HINTS & SOLUTIONS

ANSWER KEY

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

HINTS & SOLUTIONS

1. (4)
2. (3)
3. (4)
4. (1)
5. (1)
6. (2)
7. (1)
8. (5)
9. (1)
10. (4)
11. (5)
12. (1) 'has' should be replaced by 'had'.
13. (2) 'for' should be replaced by 'of'.
14. (2) 'began' should be replaced with 'begin'.
15. (4) 'with' should be replaced by 'for'.
16. (3)
17. (1)
18. (1)
19. (3)
20. (4)
21. (2)
22. (3)
23. (4)
24. (5)
25. (3)
26. (5)
27. (4)
28. (3)
29. (1)
30. (4)

31. (5) I. $13 = x$ II. $y^{\frac{5}{2}} = 13^{\frac{5}{2}}$ $y = 14$

$\therefore x = y$

32. (2) I. $x^3 = 1331$ II. $y^2 = 121$

$x = 11$ $y = \pm 11$

$\therefore x \geq y$

33. (3) I. $x^3 - 529 = 471$ II. $y^3 - 1248 = 480$

$x^3 = 1000$ $y^3 = 1728 = y = 12$

$x = 10$ $\therefore y > x$

34. (5) I. $3x^3 - 5x - 8 = 0$ II. $y^2 - 3y + 2 = 0$

$x = \frac{8}{3}, -1$ $y = 2, 1$

Relation can't be established.

35. (3) I. $x^2 + 25x + 144 = 0$ II. $y^2 - y - 12 = 0$

$x = -16, -9$ $y = +4, -3$

$\therefore y > x$

36. (4) Data given in both statements together are not sufficient to answer the question. As by these data we find two numbers 48 and 84, but we cannot find the exact number.

37. (5) Both the statements are required to answer the question.
From statement I : We can say that one digit should be '0'. As 20, 30, 40, 50, ...
From statement II : Difference is 4. So the number is 40.

38. (4) Data in both the statements together are not sufficient to answer the question.

39. (5) A's salary = 50% of C $= \frac{C}{2}$

B's salary = C's salary $= \frac{2}{5}C$

$\therefore A = \frac{C}{2}, \ B = \frac{2}{5}C$

Let x% of A's salary be B's salary.

$\therefore \frac{x}{100} \times A = B$

$\therefore \frac{100B}{A} = \frac{100 \times \frac{2C}{5}}{\frac{C}{2}} = \frac{200C}{5} \times \frac{2}{C} = 80\%$

40. (2) Statement II alone is sufficient.

$W = \frac{80}{100} \times B = \frac{4}{5}B$

$\therefore \frac{B}{W} = \frac{5}{4} = 5 : 4$

41. (2) $A_{2013} = 540000 \times \frac{120}{100} \times \frac{130}{100} = 842400$

42. (4) Let its population in year 2011 = 100

$$\therefore \text{Population}\,(2013) = 100 \times \frac{115}{100} \times \frac{115}{100} = 132.25$$

i.e. % increase = 32.25%

43. (4) Let the population of D & E are 'X' in year 2012

$$D_{2013} = x \times \frac{125}{100} = 1.25x,$$

$$E_{2013} = x \times \frac{145}{100} = 1.45x,$$

$$\therefore \text{Req.}\% = \frac{1.45x}{1.25x} \times 100 = 116\%$$

44. (3) $$F_{2011} = 1684800 \times \frac{100}{130} \times \frac{100}{135} = 960000$$

45. (3) $$D_{2013} = 600000 \times \frac{135}{100} \times \frac{125}{100} = 1012500$$

$$B_{2013} = 600000 \times \frac{125}{100} \times \frac{120}{100} = 900000$$

Diff. = 1012500 – 900000 = 112500

46. (4) Average number of employees working in organisaiton D

$$= \frac{(388 + 432 + 406 + 454 + 440 + 418)}{6} = \frac{2538}{6} = 423$$

47. (5) Reqd. Percent $= \frac{37700}{(2016)}\% = 18.7\% = 20\%\,(\text{Approx.})$

48. (1) Required ratio

= No. of employees working in organization A in 2013 / No. of employees working in organization E in 2013

$$= \frac{400}{512} = \frac{25}{32} = 25 : 32$$

49. (3) Reqd. difference

$$= \left(\frac{247 + 324 + 331 + 375 + 345 + 400}{6}\right)$$

$$= \left(\frac{197 + 225 + 263 + 377 + 396 + 432}{6}\right)$$

$$= \left(\frac{2022}{6}\right) - \left(\frac{1890}{6}\right) = 337 - 315 = 22$$

50. (2) Reqd. difference = (298 + 385+412+404+323+356)

= (388+432+406+454+440+418)

= (2178) – (2538) = 360

51. (3) Subtracting 24, 21, 18, 15, 12.

52. (4) Dividing previous number by 4.

53. (5) Go on adding 7, 9, 11, 13, 15, ...

54. (1) The series is:

7 × 1 + 1 = 8

8 × 2 + 2 = 18

18 × 3 + 3 = 57

57 × 4 + 4 = $\boxed{232}$ not 228

2328 × 5 + 5 = 1165

1165 × 6 + 6 = 6996

∴ 228 is wrong.

55. (2) The series is:

1 × 1 = 1

1 × 2 = 2

2 × 3 = 6

6 × 4 = 24

24 × 5 = $\boxed{120}$ not 96

120 × 6 = 720

∴ 96 is wrong.

56. (2)

57. (1) Volume of the sphere

$$= \frac{4}{3}\pi r^3 = \frac{4}{3} \times \frac{22}{7} \times 210 \times 210 \times 210 = 38,808,000\ \text{m}^3$$

∴ Volume of the wire = 38,808,000

$$\Rightarrow \pi r^2 h = 38,808,000 \Rightarrow r^2 = \frac{38808000}{105 \times 1000} \times \frac{7}{22}$$

$$\Rightarrow r^2 = 117.6 \qquad \Rightarrow r = 10.84\ \text{m}.$$

58. (4) Ratio of Ram and Shyam profit

$$= \left[(40000 \times 12) + (90000 \times 12)\right] : \left[(80000 \times 12)\right]$$

= 156 : 96 = 13 : 8

∴ Share of Shyam the profit

$$= \frac{8}{21} \times 98700 = \text{Rs.}37600$$

59. (3) Let the sum be Rs. x

4781.70 = x ×1.05 ×1.1×1.15

$$x = \frac{4781.70}{1.05 \times 1 \times 1.15} = \text{Rs.}3600$$

60. (2) Total number of ways without restriction = 6!

Total number of ways after taking two girls as one single entry = 5!

Two girls can sit in 2! Ways among themselves.

Total number of ways that two girls don't together

=6! – 5! × 2! = 480

61. (2) $$\left(7^2\right)^{\frac{3}{2}} \div \left(7^4\right)^{-2} \times (7)^{-8} = 7^3 \div 7^{-8} \times 7^{-8} = 7^3$$

$$\Rightarrow \left(\sqrt{7}\right)^6 \qquad \Rightarrow \therefore ? = 6$$

62. (2) $$\frac{?\times 62.5}{100} = 24 \div 1.2 = 20, \qquad \therefore ? = \frac{20 \times 100}{62.5} = 32$$

63. (4) $$8.37 + \frac{299.46}{?} = 15.5, \quad \frac{299.46}{?} = 15.5 - 8.37 = 7.13$$

$$\therefore ? = \frac{299.46}{7.13} = 42$$

64. (5) $$\frac{12.5 \times ?}{100} = (78 \div 2.6) \times 2.5 = 30 \times 2.5 = 75$$

$$\therefore ? = \frac{75 \times 100}{12.5} = 600$$

65. (3)

$$?\times 12 = \frac{8540 \times 65}{100} - \frac{6440 \times 35}{100} = 5551 - 2254 = 3297$$

$$\therefore ? = \frac{3297}{12} = 274.75$$

66. (3)

67. (2) A ≤ C = F

So, A ≤ F

So either I or II is true

Also given Z ≥ X, F < X

Combining both Z ≥ X > F, Z > F.

So III is true.

68. (2)

69. (5)

70. (3) Given A ≥ C, C = P, P > D
Combining all the above
A ≥ C = P > D
A ≥ C = C > D
So, A > D,
Given A ≥ C, C = P, P > X
Combining all these
A ≥ C = P > X
A ≥ C > X
A > X, So II is true
D < P, P > X
Combining both
D < P > X
Can't compare D and X. So, III is not true.

71. (4) Assumption 1 and 2 is implicit that why M. P. will be a power surplus in the future. Assumption III does not substantiates as it talks about the growth rate in the fiscal. Assumption V is course of action once the M. P. will be a power surplus.

72. (5) All the three points validates in making the price lower in the current year.

73. (5) All point highlights the probable cause of suicide.

74. (4) With proper attention to poor states and establishing a national authority can help India to curbing the hunger by fifty percent.

75. (4) Only A, B and D helped the reliance to earn profit in the quarter.

76. (2) The person from Bank of Maharashtra is an immediate neighbor of A

77. (5) S

78. (4) The person from Syndicate Bank and D at extreme ends of the rows.

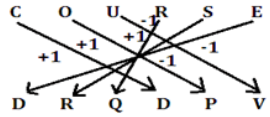
79. (1) The person from Indian Bank is faces the person from Bank of Maharashtra.

80. (4) D is related to Indian Bank.

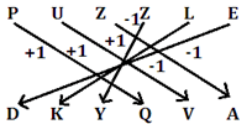
81. (1) The problem arise because the airport authorities do not have gold evaluators at the airport.

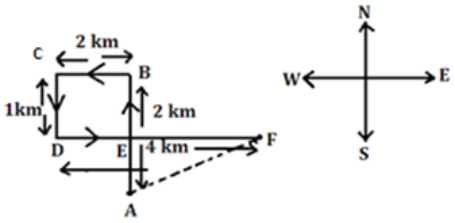
82. (3) Appointing an gold appraiser would be a relief for both passenger and airport authorities.

83. (1) Let A be the man's home and F the market



Similarly,





84. (1) The movement of Sachin shown in the fig.
i.e. from A to E.
Since BC = AF = 30 m.
and AB = CF = 20 m. then ,
= CD = CF + FD, FD = CD – CF = 28 -20 = 8 m.
= Clearly, DEF is right angled at F
= So, DE^2 =

$$\sqrt{FD^2 + FE^2} = FE = \sqrt{DE^2 - FD^2} \Rightarrow \sqrt{10^2 - (8)^2}$$

$$= \sqrt{100 - 64} = \sqrt{36} = 6$$

= AE = AF + FE = 30 + 6 = 36
Therefore, Sumit is 36 m. in the East from his original position.

85. (2) K – J – I – H – F – G

86. (3)

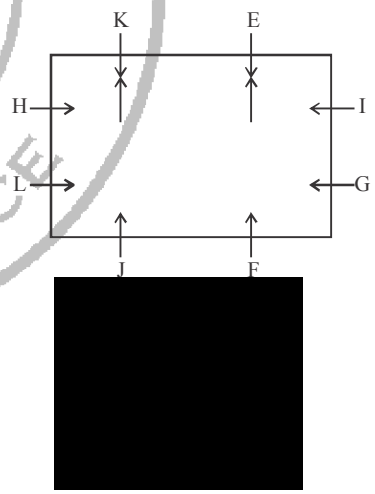
87. (3) Due to the complaints against MLA for misusing the MLA fund the govt. decides to bring Mohalla Sabhas for proper use of funds.

88. (4)

89. (4) It is clear the government wants citizens to take up development projects and handle the development of their area.

90. (5) None of the given options is a possible effect of the step.

91 – 95.



91. (5)

92. (1)

93. (5)

94. (2)

95. (3)

96-100. Oranges are famous of Nagpur city – fe rm ge sd eq sp. .....(i)
Nagpur is famous city – sj ge sp rm .....(ii)
City is alos famous for oranges – sj ok sp cf sd ge .....(iii)
We are coming for oranges – eq cf g sew sd .....(iv)
From eq. (i), (ii) and (iii) famous – sp

From eq. (i), (ii) and (iii) Nagpur – rm
From eq. (i) and (iii) oranges – sd
From eq. (ii) and (iii) is – sj
From eq. (i),(ii) and (iii) city – ge
From eq. (i) and (iv) are – eq
From eq. (i) of – fe
From eq. (iii) and (iv) for – cf
From eq. (iii) also – ok
From eq. (iv) we/coming – ew or gs

96. (5)
97. (4)
98. (3)
99. (5)
100. (5)