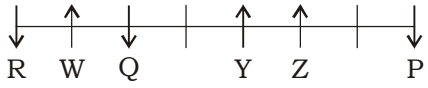
IBPS PO SPECIAL PHASE - I - 316 (SOLUTION)

REASONING

(1-6) :



1. (4) 2. (5) 3. (3)
4. (4) 5. (1) 6. (5)
7. (4) **Given statements:**
   $W > S \geq T < U$ .....(i)
   $V > T > X$ .....(ii)
   Combining both statement,
   $S \geq T < V$
   I. $V > S \rightarrow$ False
   $V > T < U$
   II. $U > V \rightarrow$ False
   Hence, Neither conclusion I nor II is true.
8. (5) **Given statements:**
   $P = Q \geq R < S$ .....(i)
   $R \geq T$ .....(ii)
   Combining both statement,
   $T \leq R < S$
   I. $S > T \rightarrow$ True
   $P = Q \geq R \geq T$
   II. $P \geq T \rightarrow$ True
   Hence, Both conclusion I and II are true.
9. (4) **Given statements:**
   $M > N \geq O < P$ .....(i)
   $Q < O \leq R$ .....(ii)
   Combining both statement,
   $R \geq O < P$
   I. $R > P \rightarrow$ False
   $R \geq O \leq N$
   II. $R \geq N \rightarrow$ False
   Hence, Neither conclusion I nor II is true.
10. (4) **Given statements:**
    $A = B \leq C > D$ .....(i)
    $C \geq E$ .....(ii)
    Combining both statement,
    $A = B \leq C \geq E$
    I. $A \geq E \rightarrow$ False
    $E \leq C > D$
    II. $E > D \rightarrow$ False
    Hence, Neither conclusion I nor II is true.

(11-15) :

Person	Floor	Game
H	7	Badminton
R	6	Polo
N	5	Chess
L	4	Hockey
M	3	Rugby
O	2	Cricket
K	1	Ludo

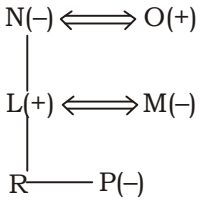
11. (2) 12. (3) 13. (4)
14. (1) 15. (4)

(16-20) :

economy and wealth balance → gh mk ru st
wealth of nations depleting → tl zm ak gh
taxes balance nations better → dj ru zm pn
better to revive economy → br ht dj st

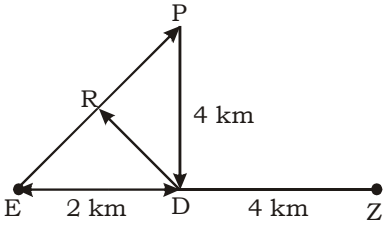
16. (2) 17. (3) 18. (1)
19. (3) 20. (1)
21. (4) 9^{th} to the left of 18^{th} from the left = (18 – 9 =) 9^{th} from the left = S
22. (2) 9
23. (5) 2 7 9 6 8 4 3 5
24. (3) * and ©
25. (2) In all others, the second element comes three positions. After the first in the given arrangement.

(26-29) :



26. (3) 27. (4) 28. (5)
29. (2)
30. (5)

(31-32) :



31. (4) 32. (4) 33. (5)
34. (3)
35. (5) After changing the series becomes as follows.
E F G H A B C D M N O P I J **K** L U V W X Q R S T Z Y
Now, the required element is (19-7 =) 12th element from right.

Maths

36.(2) Male population who did not visit park A

$= \frac{20}{100} \times \frac{60}{100} \times 400 = 48$

Male population who visited in park A
$= 400 - (150 + 48) = 202$

Required % $= \frac{202}{500} \times 100 = 40.4\%$

37.(4) Male population in park B, C & D = (500 – 200) + (700 - 350) + (800 - 450) = 1000

Required average $= \frac{1000}{3} = 333.33$

38.(5) Male population in park E = 900 - 500 = 400

Required % $= \frac{450 - 400}{400} \times 100 = 12.5\%$

39.(1) Male population in park A & D = 400 - 150 + 800 - 450 = 600
Required ratio = 600 : (200 + 500) = 6 : 7

40.(3) Total female population = 150 + 200 + 350 + 450 + 500 = 1650
Female population above 80 years age
$= 30 \times 5 = 150$

Required average $= \frac{1650 - 150}{5} = 300$

41.(2) Let present age of A & B be x & y years respectively

$\frac{x - 4}{y - 4} = \frac{5}{3}$

$3x - 12 = 5y - 20$
$3x = 5y - 8$ ..... (i)
Let present age of C be z years
$x + y + z = 80$
$x + y = z$
$x + y = 40$ ..... (ii)
On solving (i) & (ii)
x = 24 years
Present age of A = 24 years

42.(4) Let speed of boat in still water & stream be 8x kmph & x kmph respectively
ATQ,

$\frac{54}{8x + x} + \frac{42}{8x - x} = 4$

$\frac{6}{x} + \frac{6}{x} = 4$

x = 3
Downstream speed = 8x + x = 27 kmph

43.(1) Let salary of Manoj be Rs 100x

Amount given to wife $= \frac{60}{100} \times 100x$

= Rs. 60x

ATQ, $60x \times \frac{50}{100} = 18000$

x = 600
Salary of Manoj = 100x = Rs. 60000

44.(3) Let length & breadth of rectangle be 4x cm & 7x cm
ATQ, 2(4x + 7x) = 88
x = 4
Area of rectangle = $4x \times 7x = 448$ cm^2

45.(2) Radius of second circle = 1.5 × 14 = 21 cm

Required area of circle = $\pi r^2 = \frac{22}{7} \times 21 \times 21$

= 1386 cm^2

46.(5) I. $x^2 - 7x + 12 = 0$
$\Rightarrow x^2 - 4x - 3x + 12 = 0$
$\Rightarrow (x - 4)(x - 3) = 0$
$\Rightarrow x = 3, 4$
II. $y^2 - 8y + 12 = 0$
$\Rightarrow y^2 - 6y - 2y + 12 = 0$
$\Rightarrow (y - 6)(y - 2) = 0$
$\Rightarrow y = 2, 6$
No relation can be established

47.(4) I. $2x^2 + x - 28 = 0$
$\Rightarrow 2x^2 + 8x - 7x - 28 = 0$
$\Rightarrow 2x(x + 4) - 7(x + 4) = 0$
$\Rightarrow (2x - 7)(x + 4) = 0$

$\Rightarrow x = -4, \frac{7}{2}$

II. $2y^2 - 23y + 56 = 0$
$\Rightarrow 2y^2 - 16y - 7y + 56 = 0$
$\Rightarrow 2y(y - 8) - 7(y - 8) = 0$
$\Rightarrow (2y - 7)(y - 8) = 0$

$\Rightarrow y = \frac{7}{2}, 8$

$\Rightarrow y \geq x$

48.(5) I. $2x^2 - 7x - 60 = 0$

$\Rightarrow 2x^2 - 15x + 8x - 60 = 0$

$\Rightarrow x(2x - 15) + 4(2x - 15) = 0$

$\Rightarrow (x + 4)(2x - 15) = 0$

$\Rightarrow x = -4, \frac{15}{2}$

II. $3y^2 + 13y + 4 = 0$

$\Rightarrow 3y^2 + 12y + y + 4 = 0$

$\Rightarrow 3y(y + 4) + 1(y + 4) = 0$

$\Rightarrow (3y + 1)(y + 4) = 0$

$\Rightarrow y = -\frac{1}{3}, -4$

No relation between x and y

49.(5) I. $x^2 - 17x - 84 = 0$

$\Rightarrow x^2 + 4x - 21x - 84 = 0$

$\Rightarrow (x + 4)(x - 21) = 0$

$\Rightarrow x = -4, 21$

II. $y^2 + 4y - 117 = 0$

$\Rightarrow y^2 - 9y + 13y - 117 = 0$

$\Rightarrow (y - 9)(y + 13) = 0$

$\Rightarrow y = 9, -13$

No relation between x and y

50.(4) I. $x^2 = 81$

$\Rightarrow x = \pm 9$

II. $(x - 9)^2 = 0$

$x = 9$

Clearly, $x \leq y$

51.(4) Total population of city A = 300 + 400 = 700

Total population of city D = 450 + 550 = 1000

Required % = $\frac{1000 - 700}{1000} \times 100 = 30\%$ less

52.(1) Total graduate population = $\frac{70}{100} \times (300 + 400) = 490$

Female graduate population = $\frac{4}{7} \times 490 = 280$

Female population who is not graduate = 400 - 280 = 120

53.(5) Required average

$= \frac{300 + 550 + 500 + 450 + 350}{5}$

$= \frac{2150}{5} = 430$

54.(2) Required % = $\frac{350}{400} \times 100 = 87.5\%$

55.(4) Postgraduate population in city B = 300 + 400 = 700

Postgraduate population in city C = $\frac{8}{7} \times 700 = 800$

Required ratio = (1000 - 700) : (900 - 800) = 300 : 100 = 3 : 1

56.(2) When X liter milk is taken out

Quantity of milk left = (240-X) lit

Quantity of water = X lit

When 20% of mixture taken out

Remaining quantity of milk = $\frac{80}{100} \times (240 - X) = (192 - 0.8X)$lit

Remaining quantity of water = $\frac{80}{100} \times X + \frac{20}{100} \times 240 = (0.8X + 48)$lit

ATQ,

$(192 - 0.8X) - (0.8X + 48) = 128$

$16 = 1.6X$

$X = 10$

57.(3)

	Time (days)	Work (Units)	Efficiency (units/day)
A	36	144	4
B	48		3

Work completed by A and B in mentioned days = $\frac{1}{3} \times 144 = 48$ units

ATQ, $4x + 3(x + 2) = 48$

$x = 6$

58.(1) let cost price be Rs. 100x

Marked price = $\frac{140}{100} \times 100x$ = Rs. = 140x

Selling price = Rs.(140x - 224)

Selling price after tax = $\frac{110}{100} \times (140x - 224)$

= Rs.(154x - 246.4)

ATQ, $100x + 158.6 = 154x - 246.4$

$x = 7.5$

Cost price of article = 100x = Rs. 750

59.(2) Let period of investment of Pinki and Rinki be 2x and 3x units respectively
Ratio of profit share

Pinki		Rinki
6000 × 2x	:	9000 × 3x
4	:	9

Profit share of Pinki = Rs. 20,000

60.(3) ATQ,

$$\frac{x}{40} - \frac{x+20}{60}$$

x = 280 km

Required time = $\frac{320}{40}$ = 8 hours

61.(3) $111.01 + 41.23 + (4.96)^2 + (2.09)^2 = ?$
$111 + 41 + 5^2 + 2^2 = ?$
$? = 152 + 25 + 4 = 181$

62.(1) $109.07\sqrt{?} - \frac{61}{21.02} \times ? \; 47.96\sqrt{?}$

$\Rightarrow 109\sqrt{?} - 48\sqrt{?} \approx \frac{61}{21} \times ?$

$\Rightarrow 61\sqrt{?} = \frac{61}{21} = ?$

$\Rightarrow ? = 441$

63.(4) $1332.89 + 171.928 + 17.01 + ?^2 = 1690.87$
$\Rightarrow 1333 + 172 + 17 - 1691 - ?^2$
$\Rightarrow ?^2 = 169$
$\Rightarrow ? = 13$

64.(2) 150.09% of $20 + \frac{322.9}{17.02} + \sqrt{?} = (8.96)^2$

$\Rightarrow 30 + 19 + \sqrt{?} = 81$

$\Rightarrow ? = 1024$

65.(2) 56.08% of 149.92

$+ \sqrt{28.02 \times 6.98} - 11\frac{1}{9}\%$ of $998.9 = ?$

$\Rightarrow 56\%$ of $150 + \sqrt{28 \times 7} - \frac{1}{9} \times 999 \approx ?$

$\Rightarrow 84 + 14 - 111 = -13$

Solutions (66-70) :

Let number of girls in hostel B = 100x
Then number of boys in hostel B = 200x
Number of girls in hostel A = 130x
Number of boys in hostel C = 120 + 100 = 220
Number of girls in hostel C = 1000 - 220 = 780
Total number of girls in hostel A and that of in hostel D = 446
Number of girls in hostel D = (446 - 130x)
Number of boys in hostel D = 302
ATQ,
200x - 302 = 98
x = 2

Hostels	Boys	Girls
A	120	260
B	400	200
C	220	780
D	302	186

66.(2) Required percent = $\frac{(302-186)}{(400-200)} \times 100$
= 58%

67.(1) Required difference = (302 + 186) - (120 + 260) = 108

68.(1) Required ratio = $\frac{600}{1000} = \frac{3}{5}$

69.(4) Required average

$= \frac{100 + 380 + 200 + 282}{4} = 240.5$

70.(2) Total number of boys in hostel A and that of girls in hostel C = 900

Required % = $\frac{900 - 400}{400} \times 100 = 125\%$

ENGLISH LANGUAGE

(91–95) : (CGDBFEA)

91. (2) 92. (1) 93. (3)
94. (4) 95. (2)

(96–100) :

96. (4) Replace 'with' by 'about'.
97. (3) Replace 'yet' by 'but'.
98. (1) Replace 'deliberately' by 'deliberate'.
99. (1) Replace 'based' by 'having'.
100. (5) No error.

VOCABULARIES

Word	Meaning in English	Meaning in Hindi
Nascent	Emerging; just coming into existence.	उदीयमान, उभरता हुआ
Insolvent	Unable to pay one's bills or discharge financial obiligations.	दिवालिया, निर्धन
Allege	To assert without proof.	आरोप लगाना
Ponzi scheme	A swindle in which a quick return, made up of money from new investors, on an initial investment lures the victim into much bigger risks.	छल, भ्रष्ट योजना
Pose	To assert, state, or put forward	पेश करना
Expedience	The quality of being suited to the end in view	लाभ, सुविधा
Facilitates	to make easier of less difficult	सरल बनाना, मदद देना
Prudential	Having caution with regard to practical matters; discretion	चातुर्य पूर्ण, बुद्धिमानी
Brick-and-mortar	Pertaining to conventional stores, businesses, etc., having physical buildings and facilities, as opposed to Internet or remote services.	भौतिक अस्तित्व
Complementary	acting as or providing a complement (something that completes the whole)	पूरक, पूरा करने वाला
Expedite	To speed up the progress of	शीघ्र निबटाना, जल्दी करना
Entangling	Twisted together of entwine into a confusing mass	फँसा हुआ, घिरा हुआ

IBPS PO SPECIAL PHASE - I - 316 (ANSWER KEY)

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