1. The ratio in which the rice at ₹ 7.20 per kg be mixed with rice at ₹ 5.70 per kg to produce a mixture worth ₹ 6.30 per kg, is
(a) 1 : 3 (b) 2 : 3 (c) 3 : 4 (d) 4 : 5

2. The difference between compound interest and simple interest on ₹ 8000 at 5% per annum for 3 yr is
(a) ₹ 50 (b) ₹ 60 (c) ₹ 61 (d) ₹ 600

3. Find the cost of carpenting a room 12m long and 8m broad with a carpet 75 cm wide at ₹ 20 per m².
(a) ₹ 4318 (b) ₹ 3851 (c) ₹ 2560 (d) None of these

4. \[
\frac{(598 + 479)^2 - (598 - 479)^2}{598 \times 479}
\]
is equal to
(a) 4 (b) 8 (c) 12 (d) None of these

5. Find the largest natural number which exactly divides the product of any 4 consecutive natural numbers.
(a) 26 (b) 24 (c) 32 (d) 36

6. By selling a chair for ₹ 572, a man gains 30%. The cost price of the chair is
(a) ₹ 340 (b) ₹ 400 (c) ₹ 440 (d) None of these

7. A can build a wall in 30 days, while B alone can build it in 40 days. If they build it together and get a payment of ₹ 7000, what is B’s share?

8. A man riding his bicycle covers 150 m in 25 s. What is his speed in km/h?
(a) 20 km/h (b) 21.6 km/h (c) 23 km/h (d) 25 km/h

9. If the price of tea is increased by 20%, by how much per cent must the consumption of tea be diminished, so as not to increase the expenditure?
(a) 18 \frac{2}{5} % (b) 16 \frac{2}{3} % (c) 11 \frac{1}{3} % (d) 21 \frac{1}{5} %

10. \((35614 - 26889) ÷ 25\) is equal to
(a) 317 (b) 349 (c) 356 (d) 363

11. The HCF of 42, 63, 140 is
(a) 14 (b) 9 (c) 21 (d) 7

12. The age of father and his son is 100 yr now. 5 yr ago their ages were in the ratio of 2 : 1. The ratio of the ages of father and son after 10 yr will be
(a) 4 : 3 (b) 5 : 3 (c) 3 : 5 (d) 10 : 7

13. A can do a piece of work in 8 h while B alone can do it in 12 h. Both A and B working together can finish the work in
(a) 10 h (b) 4 h (c) 5 \frac{1}{4} h (d) 4 \frac{4}{5} h

14. How is \(\frac{1}{2}\) % expressed as a decimal fraction?
(a) 0.0005 (b) 0.005 (c) 0.05 (d) 0.5

15. Find the area of a square one of whose diagonals is 2.4 m long
(a) 2.88 m² (b) 3.44 m² (c) 4.12 m² (d) None of these

16. AB and CD are lines, P is point on AB. A line PQ meets CD at R. If \(\angle BPR = 30^\circ\) and \(\angle CRQ = 150^\circ\), then
(a) AB and CD are perpendicular (b) AB and CD are parallel (c) CD and PQ are perpendicular (d) None of the above

17. If \(\sec \alpha = \frac{5}{4}\), then \(\frac{\tan \alpha}{1 + \tan^2 \alpha}\) is equal to
(a) \(\frac{9}{25}\) (b) \(\frac{12}{25}\) (c) \(\frac{3}{4}\) (d) \(\frac{1}{25}\)

18. It is between 3 pm and 4 pm and the distance between the hour and the minute hands of clock is 18 min space. What time does the clock show?
(a) 3:12 pm (b) 3:31 pm (c) 3:27 pm (d) 3:36 pm

19. In a bag, there are coins of 50 paise, 25 paise and ₹ 1 in the ratio of 5 : 6 : 2. If there are in all ₹ 42, how many 25 paise coins are there?
(a) 60 (b) 52 (c) 34 (d) 42

20. In a school 70% of the students are girls. The number of boys is 510. Then, the total number of students in the school is
(a) 850 (b) 1700 (c) 1830 (d) 1900
21. Syama travels a distance of 5 km from a place A towards North, turns left and walks 3 km, again turns right and walks 2 km. Finally, she turns right and walks 3 km to reach the place B. What is the distance between A and B?
(a) 7 km  (b) 12 km  (c) 2 km  (d) 10 km

22. Complete the series AZ, GT, MN, ? YB
(a) SK  (b) JH  (c) SH  (d) TS

23. 

In the given figure, the circle represents youths, triangle represents uneducated persons and rectangle represents employed persons. Which number represents youth, uneducated and unemployed person?
(a) 6  (b) 3  (c) 2  (d) 5

24. Juhi's position from the left in a row of students is 12th and Rakhi's position from the right is 20th. After interchanging their positions, Juhi becomes 22nd from the left. How many students are there in the row?
(a) 30  (b) 31  (c) 41  (d) 34

25. If + is ×, − is +, × is ÷ and ÷ is −, then the value of 9 – 5 + 4 – 3 × 2 will be
(a) 2 1/2  (b) –9 1/2  (c) –3 1/4  (d) 30 1/2

26. Which of the following diagrams represents the best relation among the medicine, man and surgeon?
(a)  (b)  (c)  (d)

Directions (Q. No. 27) In each of the following letter series, some of the letters are missing, which are given in that order as one of the alternative below.
27. _bbca_bcca_ac_a_cb
   (a) abcba  (b) acbab  (c) bacab  (d) bcaab

28. Find the number of cubes in the following figure
(a) 8  (b) 10  (c) 12  (d) 14

Directions (Q. No. 29) What will come in place of the question mark (?) in the following questions?
29. QDXM : SFYN :: UIOZ :
   (a) PAQM  (b) LPWA  (c) QNLK  (d) WKPA

Directions (Q. No No. 30) Which figure from answer figures will come in place of the question mark (?) in the following questions?
30. Question Figures

Answer Figures

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

31. Who constructed Sanchi Stupa?
(a) Chandragupta  (b) Kautiliya  (c) Gautam Buddha  (d) Ashok

32. What is the name of Megasthenes's book?
(a) Arthashastra  (b) Rigveda  (c) Purana  (d) Indica

33. Where did Lord Buddha breathe his last (Mahapari Nirvan)?
(a) Rajgir  (b) Bodh Gaya  (c) Sarnath  (d) Kushinagar

34. The most who influenced Ashoka to embrace Buddhism was
(a) Vishnu Gupta  (b) Upa Gupta  (c) Brahma Gupta  (d) Brihadrath

35. By which name was Chanakya known in his childhood?
(a) Ajaya  (b) Chanakya  (c) VishnuGupta  (d) Deogupta

36. Harshavardhana was defeated by
(a) Prabhakaravardhana  (b) Pulakesin ll  (c) Narasimavarana  (d) Sasanka

37. Sudden decrease of birth rate would cause
(a) increase in per capita income  (b) increase in investment  (c) increase in savings  (d) increase in loan requests

38. Among the following who was not a proponent of Bhakti cult?
(a) Nagarjuna  (b) Tukaram  (c) Tyagaraja  (d) Vallabhacharya

39. Mughal painting flourished during the reign of
(a) Akbar  (b) Jahangir  (c) Shahjahan  (d) Aurangzeb

40. Who was the founder of Ram Krishna Mission?
(a) Swami Vivekananda  (b) Raja Ram Mohan Rai  (c) Swami Dayananda Saraswati  (d) Ram Krishna Paramhansa

41. Which is closest star to the Earth?
(a) Sirius  (b) Sun  (c) Deneb  (d) Vega

42. The Earth rotates around an axis pointing towards
(a) The Moon  (b) The pole star  (c) The Sun  (d) Venus

43. Tsunamis are originated due to
(a) Sea waves  (b) Earthquake  (c) Hurricane  (d) Rotation of Earth

44. Mohorovicic discontinuity separates
(a) upper mantle and lower crust  (b) mantle and asthenosphere  (c) inner solid core and outer liquid core  (d) core and mantle

45. Which of the following is igneous rocks?
(a) Limestone  (b) Slate  (c) Marble  (d) Basalt

46. The canal joining Baltic Sea to North sea is
(a) Kiel Canal  (b) Suez Canal  (c) Panama Canal  (d) Boss Strait

47. The world’s longest river is
(a) Nile  (b) Gangas  (c) Amazon  (d) Mississippi Missouri

48. Which river crosses the equator twice?
(a) Amazon  (b) Congo  (c) Nile  (d) Orinoco

49. Why does an iron nail floats on mercury but sinks in water
(a) less chemical affinity of iron than mercury in water  (b) the weight of iron nail is more than water but less than mercury  (c) the density of iron is more than water but less than mercury  (d) iron is lighter than water and mercury

50. Primary photosynthetic pigment is
(a) chlorophyll-a  (b) Carotene  (c) Xanthophyll  (d) Chlorophyll-b

51. Unit of resistance is
(a) volt × amphere  (b) volt² × amphere  (c) volt/amphere  (d) amphere / volt

52. Calorimeters are generally made of
(a) copper  (b) brass  (c) aluminium  (d) zinc

53. Which of the following substances has greatest specific heat?
(a) Iron  (b) Water  (c) Copper  (d) Mercury
54. X-rays are streams of
   (a) electrons  (b) protons  
   (c) photons  (d) None of these

55. The Ozone layer absorbs
   (a) infrared radiation 
   (b) ultraviolet radiation 
   (c) X-rays  (d) γ-rays

56. Which one of the following elements is the poorest conductor of heat?
   (a) Sodium  (b) Lead  
   (c) Zinc  (d) Mercury

57. Neutron was discovered by
   (a) J J Thomson  (b) Chadwick  
   (c) Rutherford  (d) Priestly

58. NaCl has
   (a) covalent bond  (b) ionic bond 
   (c) co-ordinated bond  (d) None of these

59. Botany is also known as
   (a) Phytology  (b) Phycology 
   (c) Pedology  (d) Plantophyta

60. Mitochondria is absent in
   (a) fungi  (b) algae 
   (c) bacteria  (d) yeast

61. Souring of milk is due to
   (a) protozoa  (b) bacteria  
   (c) virus  (d) nematode

62. The food material in fungi is stored in the form of
   (a) starch  (b) glycogen  
   (c) glucose  (d) sucrose

63. Rayon is
   (a) natural silk  (b) artificial silk 
   (c) natural plastic or rubber  (d) synthetic silk

64. Which sector of Indian economy contributes largest to the gross national product?
   (a) Primary sector  (b) Secondary sector 
   (c) Tertiary sector  (d) Public sector

65. The main source of national income in India is
   (a) service sector  (b) agriculture 
   (c) industrial sector  (d) trade sector

66. “Income generated from Tourism” can be placed in which among the following?
   (a) Invisible Import  (b) Invisible Export 
   (c) Visible Import  (d) Visible Export

67. The most literate union territory in India is
   (a) Delhi  (b) Lakshadeep  
   (c) Chandigarh  (d) Pondichery

68. The least populated state in India is
   (a) Goa  (b) Sikkim  
   (c) Manipur  (d) None of these

69. What is the fixed strength of Rajya Sabha?
   (a) 210  (b) 220  (c) 230  (d) 250

70. Which one among following is not a fixed capital?
   (a) Tools  (b) Machines  
   (c) Building  (d) Money

71. The President of India enjoys emergency power over
   (a) two types  (b) three types 
   (c) four types  (d) five types

72. Who invented the Ball Pen?
   (a) Biro Brothers  (b) Waterman Brothers 
   (c) Bicc Brothers  (d) Write Brothers

73. The tenure of the Rajya Sabha is
   (a) 2 year  (b) 5 year 
   (c) 6 year  (d) permanent

74. CDs are of which shape?
   (a) Square  (b) Rectangular  
   (c) Round  (d) Information

75. What is a modern connected to?
   (a) Processor  (b) Mother board 
   (c) Printer  (d) Phone line

76. The copy commands saves to
   (a) the desktop  (b) the clipboard 
   (c) printer  (d) Microsoft-world

77. Late Raja Ravi Verma was an eminent figure in which among the following fields?
   (a) Dance  (b) Politics 
   (c) History  (d) Painting

78. Who is known as ‘Little Corporal’?
   (a) Adolf Hitler  (b) Napoleon Bonaparte 
   (c) William E Gladstone  (d) None of the above

79. Who is known as the ‘Lady with the lamp’?
   (a) Joan of arc  (b) Sarojini Naidu 
   (c) Indira Gandhi  (d) Florence Nightingle

80. Which of the following Chief Minister served for the longest tenure?
   (a) Lalu Prasad  (b) Jyoti Basu 
   (c) Ms Mayawati  (d) M Karunanidhi

81. SAARC was founded in
   (a) New Delhi  (b) Dhaka 
   (c) Geneva  (d) Thimpu

82. Who was the first winner of Dada Sahab Phalke Award?
   (a) BN Sarkar  (b) Prithvi Raj Kapoor 
   (c) Devika Rani  (d) Kanan Devi

83. Panchatantra has been written by
   (a) Kalidas  (b) Surdas 
   (c) Vishakhadatta  (d) Vishnu Sharma

84. Which country to host the ministerial meeting of International Energy Forum IEF-2018?
   (a) Sri Lanka  (b) Nepal 
   (c) India  (d) Indonesia

85. Human rights day is observed on
   (a) 10 December  (b) 14 December 
   (c) 25 December  (d) 28 December

86. Which country to host the 6th edition of ICC Women’s World Twenty 2018?
   (a) Australia  (b) England 
   (c) New Zealand  (d) West Indies

87. When is World Teacher’s Day observed?
   (a) 5 October  (b) 30 December 
   (c) 27 October  (d) 10 October

88. In archery, what shape is the target?
   (a) Square  (b) Round  
   (c) Triangular  (d) Rectangular

89. Who was called ‘flying Sikh’?
   (a) Ajmer Singh  (b) Makhan Singh 
   (c) Shamsher Singh  (d) Milkha Singh

90. Who was the first captain of Indian Test team?
   (a) Vijay Hazare  (b) C K Nayudu 
   (c) Lala Amarnath  (d) Vijay Merchant

91. Wimbledon is a place connected to
   (a) Cricket  (b) Table Tennis 
   (c) Badminton  (d) Lawn Tennis

92. Which of the trophies below is associated with cricket?
   (a) Durand Cup  (b) Charminar Challenge Cup 
   (c) Champions Trophy  (d) Rohinton Trophy

93. Separation of petroleum into its components is done by
   (a) Chromatography  (b) Sublimation 
   (c) distillations  (d) fractional distillation

94. Rusting of iron is prevented by
   (a) galvanisation  (b) by making alloys 
   (c) greasing  (d) All of these

95. Human heart is
   (a) two chambered  (b) three chambered 
   (c) four chambered  (d) none of these

96. Babies lack
   (a) Molars  (b) Pre-Molars 
   (c) Canines  (d) Incisors

97. The gaseous plant hormone is
   (a) Cytokinins  (b) Auxin 
   (c) Abscisic Acid  (d) Ethylene

98. Which of the following is a non-metal that remains liquid at room temperature?
   (a) Phosphorous  (b) Bromine 
   (c) Chlorine  (d) Helium

99. Microsoft Access is an example of
   (a) Computer  (b) DBMS 
   (c) CPU  (d) Device

100. Which of the following is not an example of database?
    (a) Cross knot game  (b) Employee payroll management 
    (c) Numeric calculator  (d) Customer management system