

MIZORAM SUBORDINATE SERVICES SELECTION BOARD**COMBINED COMPETITIVE EXAMINATION FOR
RECRUITMENT TO THE POST OF ASSISTANT
NOVEMBER - 2022**

Question Booklet Series

PAPER – II**C****Time Allowed : 3 Hours****Maximum Marks : 125****INSTRUCTIONS**

1. This paper consists of one hundred and twenty five (125) multiple-choice type of questions.
2. Immediately after the commencement of the examination, you should check that this question booklet does not have any unprinted or missing pages or items, etc. If so, get it replaced by a complete booklet from the invigilator.
3. Please note that it is the candidate's responsibility to fill in all necessary details such as Roll Number, etc. and the Question Booklet Series A, B, C or D carefully and without any omission or discrepancy at the appropriate places in the OMR Answer Sheet. Any omission/discrepancy will render the Answer Sheet liable for rejection.
4. Each question comprises four responses (answers). You will select the response which you want to mark on the Answer Sheet.
5. You have to mark your responses **ONLY** on the separate OMR Answer Sheet provided.
Read instructions given in the OMR sheet carefully.
6. All questions carry equal marks.
7. Rough work is to be done in the spaces available in the question booklet. ***Use of calculator is not permitted.***
8. You have to submit your Answer Sheet to the invigilators at the end of the examination compulsorily and must not carry it with you outside the Examination Hall. You are permitted to take away with you the question booklet on conclusion of examination.
9. There are no negative marks for incorrect answer.



1. Who was the First Mizo Ordained Pastor?
(A) Pastor Fehtea (B) Pastor Hauchhunga
(C) Pastor Chhuahkhama (D) Pastor Thangkhuma
2. In which year was the Mizo chiefs' sovereignty deposited?
(A) 1954 (B) 1950
(C) 1955 (D) 1949
3. At which time is Arte hring ban ceremony held?
(A) One day after the birth of a child
(B) On the third day from the birth of a child
(C) On the fifth day from the birth of a child
(D) On the seventh day from the birth of a child
4. Which of the following is not an Operating System?
(A) Symbian (B) Android
(C) Windows (D) All are Operating Systems
5. The file system "NTFS" stands for
(A) New Type File System (B) New Technology File System
(C) New Transfer File System (D) New Terminal File System
6. The scheme used to send unsolicited e-mail or pop-up messages to get personal and financial information is called?
(A) Phishing (B) Spamming
(C) Thrashing (D) Bugging
7. The gas used in yellow lamps of the street lights is
(A) Neon (B) Sodium
(C) Hydrogen (D) Nitrogen
8. Consider the following statements :
Assertion (A) : Afforestation prevents soil erosion.
Reason (R) : Roots of plants hold water tightly.
Select the correct answer using the codes given below.
(A) Both A and R are true and R is the correct explanation of A
(B) Both A and R are true, but R is not the correct explanation of A
(C) A is true, but R is false
(D) A is false, but R is true
9. A pencil appears bent and short when immersed obliquely (at an angle) in water. What is the phenomenon involved?
(A) Reflection of light (B) Diffraction of light
(C) Absorbption of light (D) Refraction of light
10. Which of the following was regarded as the 'Magna Carta of English Education in India'?
(A) The Charter Act (1813)
(B) The Hunter Education Commission (1882-83)
(C) The Indian Universities Act (1904)
(D) Sir Charles Wood Despatch (1854)

11. The All-Parties Conference produced the Nehru Report and advocated
1. Dominion Status as the form of government for India.
 2. Universal adult suffrage
 3. Dissociation of the state from religion in any form
 4. No reservation of seats for Muslims or any other minority group
- Select the correct answer using the codes given below.
- (A) 1, 2 and 3 (B) 2, 3 and 4
(C) 1, 2 and 4 (D) 2 and 4
12. Which of the following means freedom from direct or physical controls imposed by the government?
- (A) Privatization (B) Globalization
(C) Disinvestment (D) Liberalization
13. With regard to the National Bank for Agriculture and Rural Development (NABARD) consider the following statements :
1. Establishment of NABARD was approved by Parliament through Act 61 of 1981.
 2. NABARD is jointly owned by the World Bank and Government of India
 3. It is working in close coordination with the National Rural Livelihoods Mission for the support of Self Help Groups.
 4. It is one of the nine implementing agencies selected by Government of India for the 10,000 FPOs scheme.
- Select the correct answer using the codes given below.
- (A) All the statements are true
(B) All the statements are false
(C) 1, 2 & 3 are correct but 4 is incorrect
(D) 1, 3 & 4 are correct but 2 is incorrect
14. With the approval of the Geological Survey of India, the first geological park of India will be built in
- (A) Lamheta, Jabalpur in Madhya Pradesh
(B) Kanha National Park in Madhya Pradesh
(C) Eravikulam in Kerala
(D) Namdapha, Changlang in Arunachal Pradesh
15. Match the following :
- | | | | | |
|-----|------------------------------------|---|-----|------------------------------------|
| 1. | Chandrayaan | : | (a) | Space Mission |
| 2. | Samudrayaan | : | (b) | Mars Mission |
| 3. | Gaganyaan | : | (c) | Deep Ocean Mission |
| 4. | Mangalyaan | : | (d) | Moon Mission |
| (A) | 1 – (d), 2 – (a), 3 – (b), 4 – (c) | | (B) | 1 – (d), 2 – (c), 3 – (a), 4 – (b) |
| (C) | 1 – (d), 2 – (a), 3 – (c), 4 – (b) | | (D) | 1 – (a), 2 – (c), 3 – (b), 4 – (d) |
16. A weightlifter lifts a certain weight to win a gold medal at an International Weightlifting Federation recognized event. The colour and number of weight plates/discs on either side of the bar are one red, one blue and one green. Excluding the weight of the bar and of the clamps (collars) used for fastening the plates how much weight has the lifter lifted?
- (A) 120 Kgs (B) 140 kgs
(C) 110 kgs (D) None of these

17. Consider the following :
1. Arunachal Pradesh 2. Karnataka 3. Mizoram
In which of the above states do 'tropical wet evergreen forests' occur?
(A) 1 only (B) 2 and 3 only
(C) 1 and 3 only (D) 1, 2 and 3
18. Which of the following is the oldest iron & steel manufacturing plant in India?
(A) Bhilai Steel plant (B) Rourkela Steel plant
(C) Bokaro Steel plant (D) Tata Iron and Steel company
19. Consider the following :
1. Manipur 2. Mizoram 3. Tripura 4. West Bengal
Which of the above states share international boundary with Myanmar and Bangladesh?
(A) 1, 2, 3 & 4 (B) 2 & 3
(C) 2, 3 & 4 (D) 2 only
20. Which of the following is not a system tool?
(A) Microsoft Office (B) Disk defragmentation
(C) Backup and restore (D) None of these
21. What is virtual memory?
(A) An illusion of extremely large main memory
(B) A virtual space created in the CPU
(C) A large secondary memory in peripheral devices
(D) An extremely large memory of Super-Computers
22. Email messages that have already been sent are stored in which folder?
(A) Outbox (B) Inbox
(C) Sent (D) Spam
23. What happens when the Lok Sabha does not pass the annual Union Budget?
(A) The Budget is amended and presented again
(B) The PM submits the resignation of the Council of Ministers
(C) The Budget is referred to the Rajya Sabha for suggestions and recommendations
(D) The Union Finance Minister is forced to resign
24. The number of nominated seats in the Lok Sabha is
(A) 3 (B) 2
(C) 12 (D) 4
25. Which of the following statements is not true?
(A) The three primary nutrients needed for plant growth are nitrogen, phosphorus and potassium
(B) Soyabean crops does not require nitrogen fertilizers
(C) Mono-cropping is problematic as it encourages the build-up of diseases and pests to destroy that particular crop
(D) In inter-cropping, two or more crops grow simultaneously on the same land
26. Which among the following cell disorder is responsible for colour blindness ?
(A) WBC (B) Cone Cell
(C) Rod Cell (D) Neuron

27. The largest cargo plane, a flagship of Ukrainian aviation destroyed by the Russian invaders was
 (A) Airbus A380-800 (B) Boeing Dream lifter
 (C) Tupolev Tu-160 (D) Antonov An-225 Mriya
28. Which state is the champion of the 12th Hockey India Senior Women National Championship 2022?
 (A) Mizoram (B) Manipur
 (C) Odisha (D) West Bengal
29. Consider the following statements:
 1. The Flag Code of India took effect in 2002
 2. It was amended on 20th, July 2022 to allow the National Flag to be flown both in the day and at night.
 3. Har Ghar Tiranga campaign called for the National Flag to be flown between 12th to 15th August, 2022
 Select the correct answer using the codes given below.
 (A) All the statements are correct (B) 1 & 2 are correct but 3 is incorrect
 (C) All the statements are incorrect (D) 2 & 3 are correct but 1 is incorrect
30. A political novice who won the 2022 South Korean presidential election is
 (A) Yoon Suk-Yeol (B) Lee Jae Myung
 (C) Kim Hun Hee (D) Syngman Rhee
31. Arrange the following Padma Shri award recipients in chronological order of the year they were awarded :
 1. Nuchhungi Renthlei
 2. C. Rokhuma
 3. Lalsangzuali Sailo
 4. VL Nghaka
 (A) 1, 2, 3 and 4 (B) 2, 1, 3 and 4
 (C) 1, 2, 4 and 3 (D) 3, 1, 2 and 4
32. Which of these is not a Mizo musical instrument?
 (A) Bengbung (B) Rawchhem
 (C) Tungchaw (D) Tumphit
33. Choose the correct order of pressure belts from equator to poles.
 (A) Equatorial low – Subtropical high – Subpolar low – Polar high
 (B) Equatorial low – Subtropical high – Polar high – Subpolar low
 (C) Equatorial low – Subpolar low – Polar high – Subtropical high
 (D) Subtropical high – Equatorial low – Subpolar low – Polar high
34. Consider the following districts of Mizoram :
 1. Siaha 2. Champhai 3. Aizawl
 4. Mamit 5. Kolasib 6. Serchhip
 Tropic of Cancer passes through which of the districts?
 (A) 1, 3, 4 and 6 (B) 2, 3 and 4
 (C) 2, 3, 4 and 6 (D) 3 and 5

35. Jallianwalla Bagh Massacre took place in
(A) 1917 (B) 1918
(C) 1919 (D) 1920
36. The immediate cause of the Sepoy Mutiny was
(A) annexation of Awadh
(B) higher land tax
(C) use of greased cartridges
(D) confiscation of the estates of a large number of taluqdars and zamindars
37. Write the chronological order of the following :
1. Non-Cooperation Movement
2. Swadeshi Movement
3. Khilafat Movement
4. Civil Disobedience Movement
Select the correct answer using the codes given below.
(A) 2, 3, 4 and 1 (B) 2, 3, 1 and 4
(C) 3, 2, 1 and 4 (D) 3, 2, 4 and 1
38. Herhse or Ironwood, the state tree of Mizoram also goes by the name of
(A) Phoebe Hainesiana (B) Indian Rose chestnut
(C) Aquilaria Maleccensis (D) Dipterocarpus Retusus
39. What is the name of the new common entrance test conducted for Central Universities in India?
(A) Central University Common Entrance Test
(B) Common University Entrance Test
(C) Central University Education Test
(D) Central Universities Entrance Test
40. Consider the following statements :
1. 5G can be hundred times faster than 4G
2. High band spectrum on which 5G is built upon cannot travel very far, have hard time getting through walls, windows and other hard surfaces
3. Higher capacity of 5G means more devices can get connected to a network
4. 4G uses frequencies below 6Ghz while some 5G networks use 30Ghz or more
Select the correct answer using the codes given below.
(A) 1, 2, 3 & 4 are all true (B) 1, 3 & 4 are true but 2 is false
(C) 1 & 3 are true but 2 & 4 are false (D) 3 & 4 are true but 1 & 2 are false
41. In which of the following states was the 'World Health Organisation (WHO) Global Centre for Traditional Medicines (GCTM)' recently inaugurated?
(A) Gujarat (B) Andra Pradesh
(C) Uttar Pradesh (D) West Bengal
42. A protocol used to transfer files over the internet is
(A) TCP/IP (B) FTP
(C) HTTP (D) HTML

43. Which of the following is an example of IPv4 address?
(A) 192.168.1 (B) www.google.com
(C) 2001:0db8:3c4d:0015::1a2f:1a2b (D) 172.17.4.250
44. A networking device that redirects the IP packets towards the destination using the destination address stored in the packet is called
(A) Switch (B) Router
(C) Tower (D) Redirector
45. By what method of election are members of the Rajya Sabha elected?
(A) Proportional Representation (B) Majority System
(C) Mixed System (D) Referendum
46. Mizo Accord was signed on
(A) 20th February 1986 (B) 20th June 1986
(C) 15th August 1986 (D) 30th June 1986
47. Under the _____, Article ___ of the Indian Constitution was amended to reduce voting age from 21 years to 18 years in India.
(A) 62nd Constitutional Amendment Act of 1989, 326
(B) 61st Constitutional Amendment Act of 1988, 326
(C) 63rd Constitutional Amendment Act of 1988, 324
(D) 66th Constitutional Amendment Act of 1988, 321
48. Which type of currency will be introduced by the central bank of India (RBI) during the 2022-23 financial year?
(A) Fiat Currency (B) Digital Currency
(C) Crypto-currency (D) All of these
49. A centrally sponsored scheme-National Rural Livelihoods Mission is associated with
(A) Formation and Nurturing of Self help Groups (SHGs)
(B) Universal Financial Inclusion
(C) Socio-economic empowerment of rural women
(D) All of the above
50. Disguised unemployment is a situation
(A) of unemployment due to changes in the economic structure of the society
(B) when the number of workers engaged in a job is much more than actually required
(C) of unemployment due to displacement of old technology by a new one
(D) when a person does not get a full time job
51. Which of the following are the advantages of synthetic detergents over soaps?
1. They are stronger agents than soap
2. They can work in hard water
3. They can work in acidic water
4. They are biodegradable
Select the correct answer using the codes given below.
(A) 2 and 3 (B) 1 and 4
(C) 1, 2 and 3 (D) 2, 3 and 4

52. The modern periodic table is based on
 (A) atomic mass (B) physical properties
 (C) atomic number (D) mass number
53. What are the three R's to save the environment?
 (A) Reduce, Reuse, Recycle (B) Reduce, Reproduce, Recycle
 (C) Replenish, Reduce, Reuse (D) Reconstruct, Recycle, Reduce
54. Wheat is a _____ crop in India.
 (A) Kharif (B) Zaid
 (C) Rabi (D) Autumn
55. Arrange the following rivers in ascending order based on their length :
 1. Tiau lui 2. Chhimtuipui 3. Tlawng lui 4. Khawthlang tuiipui
 (A) 1, 2, 3, 4 (B) 2, 3, 4, 1
 (C) 4, 2, 1, 3 (D) 4, 1, 2, 3
56. Stars appear to move from East to West because
 (A) whole universe is moving from East to West
 (B) Earth is revolving around the Sun
 (C) Earth is rotating from East to West
 (D) Earth is rotating from West to East
57. The Lahore Session of Muslim League passed a resolution demanding the partition of the country on
 (A) 23 March 1940 (B) 24 March 1940
 (C) 26 March 1940 (D) 28 March 1940
58. Match the following :
 1. Nawab Abdul Latif : (a) Ram Krishna Mission
 2. Sir Sayyed Ahmed Khan : (b) Mohammedan Literary Society
 3. Mahadev Govind Ranade : (c) Aligarh Movement
 4. Vivekananda : (d) Prarthana Samaj
 Select the correct answer using the codes given below.
 (A) 1 – (b); 2 – (c); 3 – (d); 4 – (a) (B) 1 – (d); 2 – (c); 3 – (b); 4 – (a)
 (C) 1 – (b); 2 – (c); 3 – (a); 4 – (d) (D) 1 – (d); 2 – (c); 3 – (a); 4 – (b)
59. The 'Communal Award', which was a proposal on minority representation, was recommended by
 (A) Clement Atlee (B) Stafford Cripps
 (C) A. V. Alexander (D) Ramsay McDonald
60. The following domain name extension is usually reserved for an educational institute
 (A) inst (B) org
 (C) res (D) edu
61. In Microsoft Exel, the function that helps you in adding up data in cells is
 (A) SUM() (B) ADD()
 (C) TOT() (D) PLUS()

62. Which of the following must be contained in a URL?
(A) A protocol identifier
(B) The unique registered domain name
(C) A protocol identifier and the unique registered domain name
(D) www and the unique registered domain name
63. How many satellites were launched by the ISRO using its PSLV-C51 Rocket?
(A) 23 (B) 19
(C) 16 (D) 21
64. The theme of the 'International Museum Day 2022' is
(A) Bio-restoration in Museums
(B) Power of Museum
(C) The Future of Museums: Recover and Reimagine
(D) Museum for Equality: Diversity and Inclusion
65. Which is India's first state to record 100 percent first-dose vaccinations against Covid-19 for all eligible adults?
(A) Telangana (B) Himachal Pradesh
(C) Tamil Nadu (D) Karnataka
66. Consider the following criteria for qualification with regard to reservation for the Economically Weaker Sections (EWS) :
1. Your annual family income should be below 8 lakh rupees.
2. If your family owns any agricultural land, it should be less than 5 acres.
3. If you or your family owns a flat, the area of the flat should be less than 1000 square feet.
4. You must fall under the general category, SC, ST or OBC categories to avail the EWS reservation.
Select the correct answer using the codes given below.
(A) 1, 2, 3 & 4 are all incorrect (B) 1 & 2 are correct but 3 & 4 are incorrect
(C) 1, 2, 3 & 4 are all correct (D) 1, 2 & 3 are correct but 4 is incorrect
67. The ancestral Mizos believed that the earth rested on a huge
(A) Cat (B) Tortoise
(C) Wild pig (D) Snake
68. In Mizo traditional society, the person who gets to select the plot for jhum first was called
(A) Puithiam (B) Zalen
(C) Ramhual (D) Khawnbawlupa
69. A pig slain for children during Chawngchen is known as
(A) Sabebuh (B) Vawkpasutnghak
(C) Vawkpathiangtalh (D) Sekhuang
70. What is the regulatory body for the Capital Markets in India?
(A) Bombay Stock Exchange (B) Securities and Exchange Board of India
(C) Reserve Bank of India (D) Forex

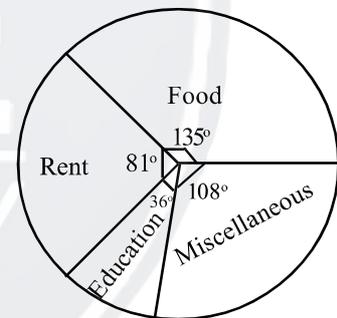
71. The minimum percentage of deposits that a commercial bank has to maintain in the form of liquid cash, gold or other securities is called
- (A) Cash Reserve Ratio (B) Minimum Margin Requirements
(C) Statutory Liquidity Ratio (D) Credit Minimum Requirements
72. Consider the following :
1. Abolition of intermediaries
 2. Regulation of rent
 3. Expansion of irrigation facilities
 4. Ceiling on land holdings
- Which of the above were part of the Indian government's 1st phase of land reforms policy between 1950-72?
- (A) 1 and 2 (B) 3 and 4
(C) 1, 2 and 4 (D) 1, 2, 3 and 4
73. What is the quorum required to hold a meeting in either House of Parliament?
- (A) 1/2 (B) 1/3
(C) 1/5 (D) 1/10
74. Consider the following :
1. To protect the environment, forests and wildlife.
 2. To protect children against exploitation and to provide opportunities for their healthy development in conditions of freedom and dignity.
 3. State shall minimize inequality in income, status, facilities and opportunities among individuals and groups.
 4. The state shall endeavour to provide early childhood care and education for all children until they complete the age of six years.
- Which of the above were added in the Directive Principles of State Policy by the 42nd Constitutional Amendment Act of 1942?
- (A) 3 and 4 (B) 1 and 2
(C) 2 and 3 (D) 2 and 4
75. Who can legislate on the Residuary Powers of the government?
- (A) Union government (B) State governments
(C) Union and State governments (D) President
76. If $x + \frac{1}{x} = 5$, then the value of $x^4 + \frac{1}{x^4}$ is
- (A) 23 (B) 527
(C) 25 (D) 529
77. The average age of 19 boys and a teacher is 15 years. If the teacher's age is excluded, then the average age is reduced by 2 years. What is the teacher's age?
- (A) 53 years (B) 50 years
(C) 49 years (D) 47 years
78. Two numbers are in the ratio 4 : 5 and their LCM is 540. The smaller number is
- (A) 300 (B) 240
(C) 135 (D) 108



79. An article was sold at a profit of 15%. Had it been sold for Rs. 600, the profit would have been 20%. The former selling price of the article was
(A) Rs. 500 (B) Rs. 540
(C) Rs. 600 (D) Rs. 575
80. The profit earned after selling an article for Rs. 625 is the same as the loss incurred after selling the article for Rs. 435. The cost price of the article is
(A) Rs. 520 (B) Rs. 530
(C) Rs. 540 (D) Rs. 550
81. If two equal solid cubes are joined end-to-end to form a solid cuboid, then the two cubes and the cuboid will have
(i) equal volumes (ii) equal surface areas
(iii) unequal surface areas (iv) unequal volumes
Which of the above statement(s) is/are correct?
(A) (i) only (B) (ii) only
(C) (i) and (iii) only (D) (ii) and (iv) only
82. There are two wires of lengths 44cm each. One wire is used to form a circle and the other to form a square. Then, the
(i) circle and the square will have equal areas
(ii) circle and the square will have unequal areas
(iii) area of the square will be more than that of the circle
(iv) area of the circle will be more than that of the square
Which of the above statement(s) is/are correct?
(A) (i) only (B) (ii) only
(C) (i) and (iii) only (D) (ii) and (iv) only
83. A metallic solid sphere of radius 12cm is melted and recast into three smaller solid spheres. If the radii of two smaller spheres are 6cm and 8cm respectively, the radius of the third sphere is
(A) 5 cm (B) 7 cm
(C) 9 cm (D) 10 cm
84. In how many ways can the letter of the word 'AIZAWL' be arranged?
(A) 720 (B) 300
(C) 360 (D) 430
85. A committee of 5 members is to be formed out of 3 girls, 4 teachers and 6 boys. In how many different ways can this be done if the committee should have all 4 teachers and 1 boy or all 3 girls and 2 teachers?
(A) 12 (B) 15
(C) 18 (D) 20
86. If $\frac{1}{3}$ of a number is 493, then $\frac{9}{17}$ of that number is
(A) 87 (B) 609
(C) 783 (D) 107

87. If $0.04 + x^2 = 13$, then the value of x is
 (A) 2.6 (B) 2.4
 (C) 3.4 (D) 3.6
88. In a garden, the number of rows is equal to the number of plants plotted in each row. If the capacity of the plants in the garden is 2116, the number of plants in each row is
 (A) 34 (B) 36
 (C) 44 (D) 46
89. A single discount equivalent to two successive discounts of 20% and 10% is
 (A) 30% (B) 28%
 (C) 15% (D) 200%
90. A TV set, having marked price Rs. 18,500 is sold for Rs. 14,060 after two successive discounts. If the first discount is 20%, what is the rate of the second discount?
 (A) 10% (B) 8%
 (C) 5% (D) 4%
91. 'A' started a business with a capital of Rs. 45,000 and was joined afterwards by 'B' with a capital of Rs. 54,000. After how many months did B join, if the profits at the end of the year were divided in the ratio 2 : 1?
 (A) 7 months (B) 6 months
 (C) 5 months (D) 4 months

Directions (Questions 92 and 93) : The given piechart shows the monthly expenses on five different items of a college student. Study the piechart carefully and answer the questions that follow:

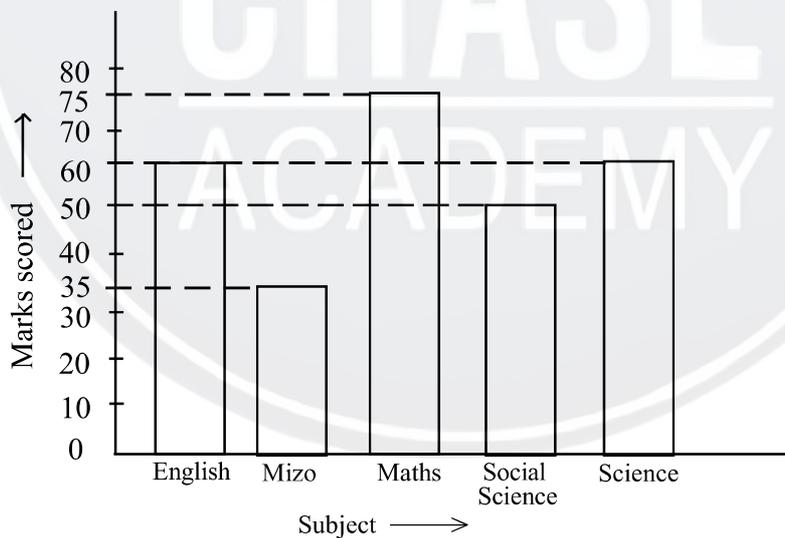


92. If the expenditure on education is Rs. 1,600, the expenditure on rent is
 (A) Rs. 16,000
 (B) Rs. 6,000
 (C) Rs. 4,800
 (D) Rs. 3,600
93. What is the ratio of expenses between rent and food?
 (A) 3 : 5 (B) 5 : 3
 (C) 9 : 4 (D) 4 : 9
94. A and B started a partnership business. A invested Rs. 8,000 for 8 months and B remained in the business for 4 months. Out of the total profit, B claimed $\frac{2}{7}$ th of the profit. How much money was contributed by B?
 (A) Rs. 5,000 (B) Rs. 5,400
 (C) Rs. 6,400 (D) Rs. 7,400
95. In a class of 63 students, the ratio number of girls to boys is 4 : 3. If 3 girls leave the school, the ratio of number of girls to boys would be
 (A) 11 : 9 (B) 9 : 11
 (C) 3 : 4 (D) 4 : 3

96. A and B can finish a piece of work in 20 days and 12 days respectively. A started the work alone and then after 4 days B joined him till the completion of the work. Time taken by them to finish the remaining work is
- (A) 4 days (B) 6 days
(C) 8 days (D) 10 days
97. If $\frac{1}{2}A = \frac{2}{3}B = \frac{3}{4}C$ of C, then A : C is
- (A) 3 : 4 (B) 4 : 3
(C) 3 : 2 (D) 2 : 3
98. The sum of two rational numbers is $\frac{-3}{2}$. If one of the numbers is $\frac{-5}{4}$, the other number is
- (A) $-\frac{1}{4}$ (B) $\frac{1}{4}$
(C) $\frac{1}{2}$ (D) $-\frac{1}{2}$
99. The value of $\frac{0.204 \times 42}{0.07 \times 3.4}$ is
- (A) 24 (B) 36
(C) 49 (D) 64
100. The average of 3 numbers is 8 and that of another 2 numbers is 3. The average of those 5 numbers is
- (A) 7 (B) 6
(C) 5 (D) 4
101. A pipe can fill an empty tank with water in 2 hours. Because of the leakage in the bottom of the tank, it took $2\frac{1}{2}$ hours to fill the tank. If the tank is full, time taken by the leakage to empty the tank is
- (A) $4\frac{1}{2}$ hours (B) 5 hours
(C) $6\frac{1}{2}$ hours (D) 10 hours
102. The average of marks obtained by 100 students was 35. If the average of marks of passed students was 40 and that of failed students was 20, then the number of students who passed the examination was
- (A) 65 (B) 68
(C) 75 (D) 78
103. The length of the shadow of a vertical tower
- (i) increases as the sun's elevation increases.
(ii) decreases as the sun's elevation decreases.
(iii) decreases as the sun's elevation increases.
(iv) becomes zero when the sun's elevation is 90° .
- Which of the above statement(s) is/are correct?
- (A) (i) only (B) (iii) and (iv) only
(C) (iv) only (D) (ii) and (iii) only

104. The price of milk increases by 25%. If a family wants to spend the same amount of money as before on milk, how much percent less milk the family must get?
 (A) 15% (B) 18%
 (C) 20% (D) 25%
105. Two pipes A and B can fill a tank in 15 hours and 20 hours respectively. While a third pipe C can empty the full tank in 25 hours. If all the three pipes are opened in the beginning and after 10 hours pipe C is closed, time taken to fill the remaining part of the tank is
 (A) 12 hours (B) 10 hours
 (C) 2 hours (D) 1 hour
106. Rina starts walking from a place at 7 A.M. at a speed of 10km/hr. Fela also starts walking from the same place but at 9 A.M. on the same route at a speed of 15km/hr. They will meet at
 (A) 11 A.M. (B) 12 Noon
 (C) 1 P.M. (D) 2 P.M.
107. The tops of two vertical poles of heights 25m and 37m are connected by a rope. If the rope makes an angle of 30° with the horizontal, then the length of the rope is
 (A) 24 m (B) 20 m
 (C) 16 m (D) 8 m

Directions (Questions 108 and 109) : The given bar graph shows the marks scored by Liana in an examination. Study the graph carefully and answer the questions that follow:



108. Average of marks scored by Liana is
 (A) 35 (B) 50
 (C) 56 (D) 60
109. Range of marks scored by Liana is
 (A) 25 (B) 40
 (C) 45 (D) 55

110. A vertical tree 15m high is broken by the wind in such a way that its top reaches the ground and makes an angle of 30° with the horizontal ground. At what height from the ground did the tree break?
- (A) 17.3 m (B) 8.1 m
(C) 7.5 m (D) 5 m
111. Thanga and Liana start a business by investing money in the ratio 4 : 3. If 9% of the total profit goes to Charity and Thanga's share is Rs. 1196, then the total profit is
- (A) Rs. 2,890 (B) Rs. 2,700
(C) Rs. 2,400 (D) Rs. 2,300
112. The least number which must be added to 8200 to make it a perfect square is
- (A) 81 (B) 154
(C) 75 (D) 107
113. The smallest number by which 3087 may be divided so that the quotient is a perfect cube, is
- (A) 3 (B) 7
(C) 9 (D) 49
114. If A's income is 10% less than B's income and C's income is 10% more than A's income, then
- (i) B's income is 1% less than C's.
(ii) C's income is 1% less than B's.
(iii) A's income is $9\frac{1}{11}$ % less than C's.
- Which of the above statement(s) is/are correct?
- (A) (i) only (B) (ii) only
(C) (i) and (iii) only (D) (ii) and (iii) only
115. 33% marks are required to pass an examination. A candidate who gets 210 marks fails by 21 marks. What are the total marks in the examination?
- (A) 700 (B) 750
(C) 800 (D) 850
116. A shopkeeper buys an article for Rs. 80 and marks it at Rs. 120. He then allows a discount of 40%. What is the percentage of loss or gain?
- (A) 12% gain (B) 10% loss
(C) 10% gain (D) 12% loss
117. By selling two identical articles for the same amount, a shopkeeper gains 10% on one and loses 10% on the other. In the whole transaction the shopkeeper
- (A) loses 1% (B) gains 1%
(C) gains 2% (D) neither loses nor gains
118. 1500 children in a school had enough chocolates for 45 days. But some children never came to school and chocolates lasted for 60 days. How many children never came to school?
- (A) 370 (B) 375
(C) 380 (D) 39

119. If 18 men can build a wall 140m long in 42 days, in how many days would 30 men be able to construct a similar wall 100m long?
- (A) 18 days (B) $35\frac{7}{25}$ days
(C) 19 days (D) 20 days
120. The value of $\sqrt[4]{(625)^3}$ is
- (A) 25 (B) 55
(C) 75 (D) 125
121. If a man walks at a speed of 5km/hr, he misses a train by only 7 minutes. However, if he walks at the speed of 6km/hr, he reaches the train station 5 minutes before the arrival of the train. The distance covered by him to reach the station is
- (A) 5 km (B) 6 km
(C) 7 km (D) 8 km
122. A train 100m long is running at a speed of 60km/hr. Time taken by the train to pass an electric post is
- (A) 6 secs (B) 5 secs
(C) 4 secs (D) 3 secs
123. A sum of money is invested for 3 years at compound interest at 5%, 10% and 20% p.a. respectively. If the sum amounts to Rs. 16,632 in the three years, the sum of money is
- (A) Rs. 14,000 (B) Rs. 13,000
(C) Rs. 12,500 (D) Rs. 12,000
124. Rs. 300 becomes Rs. 420 in 2 years at simple interest. What will Rs. 500 amount to in $2\frac{1}{2}$ years at simple interest, the rate being the same in both the cases?
- (A) Rs. 720 (B) Rs. 750
(C) Rs. 800 (D) Rs. 1,000
125. What amount will be received on a sum of Rs. 800 in 2 years at 5% p.a., if interest is compounded annually?
- (A) Rs. 882 (B) Rs. 880
(C) Rs. 850 (D) Rs. 800