[9] AVERAGE <1>

1. The average monthly income per person in a family of 5 members is ₹ 9000. In a certain month; each member got ₹ 900 less than usual. Find the average monthly income (in ₹) per person in that month.

(a) 6300 (b) 7200 (c) 8100 (d) 5400

2. Rahul ate 15 Chocolates on Monday; 11 on Tuesday; a certain number of Chocolates on Wednesday; 18 on Thursday and 16 on Friday. If the average number of Chocolates eaten per day on Thursday and Friday is equal to that on Monday; Tuesday and Wednesday; find the number of Chocolates that Rahul ate on Wednesday.

(a) 17 (b) 20 (c) 22 (d) 25

3. The average runs Scored by a batsman who has played 52 innings, was increased by One after an innings of 126. Find the average runs of the batsman before this innings.

(a) 71 (b) 73 (c) 64 (d) 58

4. A Salesman earned on an average ₹ 8500 for the first 10 months of the year. Howmuch should he earn on an average for the last two months; so that the average for the year becomes ₹ 11,000?

(a) ₹ 17000 (d) ₹ 23500 (c) ₹ 25750 (d) ₹ 20,000

5. I went to the market to purchase three pens. The cost of the first pen was 50% more than the second pen which in turn was $33\frac{1}{3}$% more than the third pen. If the average cost of the first two pens is ₹15 more than that of the second and the third pens; find the cost of the costliest pen?

(a) ₹40 (b) ₹45 (c) ₹50 (d) ₹60

6. In a hockey tournament the average number of goals scored by India in the first six matches was 2 while that in the last six matches was 1. If 3 goals were scored in the sixth match; find the average number of goals scored by India in the tournament if a total of 11 matches were played?

(a) 2 (b) 3 (c) 4 (d) 5

7. The average age of a group went up by 2 years when a man aged 34 years was replaced by an old man aged 58 years. How many members were there in the group?

(a) 10 (b) 18 (c) 14 (d) 12

8. The average age of 30 students of a class is 16 years. If the age of the teacher is also included; the average increased by 1 year. Find the age of the teacher.

(a) 47 years (b) 44 years (c) 42 years (d) 48 years

9. The ace leg spinner Bhayanak Singh Bedi had 1200 runs taken of him in a certain number of matches. In the next match he took 4 wickets conceding 144 runs as result of which his average (runs conceded/number of wickets taken) increased by 1. How many wickets did he take (in the matches considered) before the last match?

(a) 40 (b) 48 (c) 60 (d) 77

10. The average age of five members of a family is the same today as it was five years ago. There is no change in the family; except the elder daughter being replaced by the daughter-in-law. If the age of the elder daughter is 48 years; how old is the daughter-in-law?

(a) 20 years (b) 23 years (c) 24 years (d) 26 years

11. Sixteen men went to a hotel. Fifteen of them paid ₹80 each and the sixteenth man paid ₹75 more than the average of all the sixteen men; Find the total bill.

(a) ₹ 1020 (b) ₹ 1280 (c) ₹ 1360 (d) ₹ 1440

12. The average marks obtained by 40 students of a class is 85. The difference between the marks obtained by the student who got the highest mark and the student who got the lowest mark is 108. If both these students are removed; the average falls by 1 mark. Find the highest mark.

(a) 144 (b) 158 (c) 172 (d) 168

13. The average of n numbers is 32. If three-fourth of the numbers are increased by 4 and the remaining are decreased by 6; What is the new average?

(a) 30.0 (b) 30.5 (c) 33.5 (d) 34.5

14. I went to the market to purchase papayas. The Vendor had 12 papayas; whose average weight was 2kg per papaya. The lightest papaya weighted 1kg and the heaviest 4kg. I purchased both the [redacted] lightest and heaviest papayas. What is the average weight of the papayas that were left with the Vendor?

(a) 1.9 kg (b) 1.95 kg (c) 2.03 kg (d) 2.23 kg

15. In a class of 64 students; the average of marks obtained is 88. If the top 10 students got; on an average; 142 marks; find the average of marks obtained by the remaining students.

(a) 80 (b) 78 (c) 74 (d) 66

16. In a class; two students aged 16 years and 18 years are replaced by two students whose ages are 19 years and 21 years. If the average age of the class increased by 3 months; how many students are there in the class?

(a) 20 (b) 24 (c) 32 (d) 40

17. Find the average of the first 10 multiples of 50.

(a) 85 (b) 125 (c) 215 (d) 275

18. Six boys and Six girls Went to a hotel to have lunch. Each boy paid an equal amount and it is ₹ 20 more than what each girl paid. The bill amount Was ₹ 1380. Half of the girls as well as half of the boys left after paying their Share of the bill. Find the average amount paid by the others.

(a) ₹ 230 (b) ₹ 180 (c) ₹ 120 (d) ₹ 115

19. There are 48 students in a class. The age of one of them is twice that of another. If these 2 are replaced by 2 others Whose ages are 16 years and 11 years respectively; the average age of the class increases by 1·5 months. Find the age of the younger of the 2 Students (in years).

(a) 6 (b) 7 (c) 8 (d) 9

20. In a town during a Certain Week; every day there Was a 1°C increase in temperature over the previous day. If the average temperature for the first and last days, (i.e; Monday and Sunday) Was 37°C; What Was the average for Monday; Tuesday and Wednesday?

(a) 36°C (b) 34°C (c) 38°C (d) 35°C

21. The man bought 2 dozon apples at ₹ 24 per dozon and x dozon apples for ₹ 120. The average amount (per dozon) spent on two lots was same. Find the total number of apples with the person.

(a) 7 (b) 12 (c) 84 (d) 144

22. The average Weight of N boys in a group is 30kg. If 5 boys with an average Weight of 12 kg join the group, the average Weight would be the same as if 5 boys with an average Weight of 36 kg leave the group. Find N.

(a) 15 (b) 20 (c) 25 (d) 10

23. In a three match test series India scores an average of 325 runs in first and second test matches and an average of 300 runs in second and third test matches and an average of 350 runs in third and first test matches. Find the overall average score for the test series.

(a) 300 (b) 370 (c) 330 (d) 325

24. The average Salary of 97 Workers; 2 assistant managers and One Senior manager is ₹ 1500. The Salary of each assistant manager is ₹ 3000 and that of the Senior manager is ₹ 4000. One assistant manager and Senior manager Were replaced by two new people with Salaries of ₹ 3500 and ₹ 4500. Find the new average Salary of all the employees.

(a) ₹ 1550 (b) ₹ 1600 (c) ₹ 1510 (d) ₹ 1640

[9] AVERAGE

25. The average age of x persons is 60 years. If two persons of 52 years and 68 years leave the group and two new persons of y years and 72 years join the group, then the average age of the group increases by 1 year. If x is a perfect square and $54 < y < 64$; find the value of y.

(a) 59 (b) 55 (c) 57 (d) 61