Directions (1-5): What should come in the place of question mark in the following number series?

Q1. 5, 6, 14, 45, 184, ?
  (a) 925
  (b) 800
  (c) 825
  (d) 952
  (e) None of these

Q2. 12, 6, 6, 9, ?
  (a) 16
  (b) 18
  (c) 20
  (d) 22
  (e) None of these

Q3. 7, 8, 18, 57, 232, ?
  (a) 952
  (b) 1216
  (c) 1165
  (d) 1417
  (e) None of these

Q4. 9, 14, 21, 32, 49, ?
  (a) 85
  (b) 64
  (c) 59
  (d) 74
  (e) None of these

Q5. 14, 37, 83, 152, ? , 359
  (a) 244
  (b) 220
  (c) 261
  (d)224
  (e) None of these

Q6. The average weight of A, B and C is 26 kg. The weight of B is $\frac{1}{3}$ times that of A and the weight of C is 29 kg more than that of A. Find the weight of C ?
  (a) 40 kg
  (b) 42 kg
  (c) 50 kg
  (d) 56 kg
  (e) None of these

Q7. The diameter of a circle with area 616 cm^2 is equal to the radius of a semi-circle. Find the perimeter of the semi circle.

  (a) 140 cm
  (b) 144 cm
  (c) 130 cm
  (d) 170 cm
  (e) None of these

Q8. A person spends $\frac{1}{3}$ of his income on food. He spends the rest of the income in the ratio 4 : 1 on buying clothes and books respectively. He spent Rs. 2400 on the books. Find the total income of man.
  (a) Rs. 18000
  (b) Rs. 24000
  (c) Rs. 12000
  (d) Rs. 14000
  (e) None of these

Q9. A person bought a commodity on 30% discount on the labeled price. He sold the commodity for Rs. 4935 gaining 50% profit on its cost price. Find the labeled price of the commodity.
  (a) Rs. 4900
  (b) Rs. 5200
  (c) Rs. 4700
  (d) Rs. 4100
  (e) None of these

Q10. A mixture of 48 litres has milk and water in it in the ratio of 3 : 1. How much water must be added to the mixture so that the ratio of milk and water becomes 9 : 5 ?
  (a) 8 ltr.
  (b) 12 ltr.
  (c) 10 ltr.
  (d) 6 ltr.
  (e) None of these

Q11. The time taken by a boat to travel 117 km downstream is 9 hrs and the speed of the stream is $\frac{3}{10}$ of the speed of the boat. Find the distance travelled by the boat going upstream in 2 hrs. ?
  (a) 32 km
  (b) 14 km
  (c) 17 km
  (d) 20 km
  (e) None of these

Q12. A and B together can complete a work in $\frac{40}{3}$ days. B can complete the same work working alone in 6 more days

than that taken by A. Find the number of days taken by B to complete the work alone ?
(a) 30 days
(b) 26 days
(c) 24 days
(d) 36 days
(e) None of these

Q13. A and B can do a piece of work in $22\frac{1}{2}$ days. B takes 24 days more than A to finish the work alone. A can finish the whole work in ?
(a) 44 days
(b) 36 days
(c) 34 days
(d) 42 days
(e) None of these

Directions (14-18): The following table shows the data regarding the number of taps manufactured by five machines in different months and number of taps sold in these months.

Machine / Month	A		B		C		D		E	
	Manu.	Sold	Manu.	Sold	Manu.	Sold	Manu.	Sold	Manu.	Sold
May	321	276	215	180	296	191	418	396	334	320
June	441	286	330	315	315	297	481	296	512	472
July	502	443	490	454	372	281	496	408	417	405
August	350	323	370	354	451	402	370	361	418	297
September	417	391	472	436	371	302	390	371	424	419
October	461	371	500	495	450	417	440	397	414	348

Q14. The number of taps manufactured by machines A and C in May is how much less than the number of taps manufactured by machines B, D and E in September ?
(a) 669
(b) 691
(c) 671
(d) 654
(e) None of these

Q15. The number of taps sold by machines B and E in May is approximately what percent more/less than the number of taps sold by machines A and E in August ?
(a) 19%
(b) 26%
(c) 40%
(d) 29%
(e) 17%

Q16. The number of taps sold by machine C in May, June and July is how much less/more than the number of taps sold by machine D in August, September and October ?
(a) 410
(b) 360
(c) 430
(d) 390
(e) None of these

Q17. What is the difference between the total number of taps manufactured by machine B in all the given months and the total number of taps manufactured in September by the given machines ?
(a) 317
(b) 360
(c) 340

(d) 303
(e) None of these

Q18. What is the ratio of the sum of number of taps manufactured by machine A and D in June and the sum of no. of taps sold by the same machines in October ?
(a) 461 : 384
(b) 491 : 336
(c) 471 : 372
(d) 471 : 412
(e) None of these

19. A and B enter into a partnership with their capitals in the ratio 3 : 5. At the end of 4 months, A withdraws his capital. If they receive the profits in the ratio 4 : 5, find how long B's capital was used?
(a) 2 months
(b) 5 months
(c) 4 months
(d) 3 months
(e) None of these

20. Three Science classes A, B and C take a Life Science test. The average score of class A is 83. The average score of class B is 76. The average score of class C is 85. The average score of class A and B is 79 and average score of class B and C is 81. Then the average score. Of classes A, B and C is
(a) 80
(b) 80.5
(c) 81
(d) 81.5
(e) None of these

21. Arun borrowed a sum of money form Jayant at the rate of 8% per annum simple interest for the first four years, 10% per annum for the next 6 years and 12% per annum

for the period beyond 10 years. If he pays a total of Rs 12160 as interest only at the end of 15 years, how much money did he borrow?

(a) Rs 8000

(b) Rs 10000

(c) Rs 12000

(d) Rs 9000

(e) None of these

22. A train 75 metres long overtook a person who was walking at the rate of 6 km an hour in the same direction, and passed him in $7\frac{1}{2}$ seconds. Subsequently it overtook a second person (going in same direction as the train), and passed him in $6\frac{3}{4}$ seconds. At what rate was the second person travelling?

(a) 1 km/hr

(b) 2 km/hr

(c) 3 km/hr

(d) 4 km/hr

(e) None of these

23. There is a rectangular room whose length, breadth and height are 15m, 9m and 4m respectively. What will be the cost of painting the four walls of the room if the rate of painting is Rs. 8.40 per square metre?

(a) Rs.1484.6

(b) Rs. 1548.2

(c) Rs. 1612.8

(d) Rs. 1712.4

(e) Rs. 1804.6

24. The simple interest accrued on a sum of certain principal is Rs 1,200 in four years at the rate of 8 p.c p.a. What would be the simple interest accrued on thrice of that principal at the rate of 6 p.c.p.a. for 3 years?

(a) Rs 2,025

(b) Rs 3,025

(c)Rs.2,225

(d) Rs 2,150

(e) None of these

25. If age of P and R are added to twice the age of Q, the total becomes 59. It the ages of Q and R are added to thrice the age of P, the total become 68. And if the age of P is added to thrice the age of Q and thrice age of R, the total becomes 108, what is the total of ages of P, Q and R ?

(a) 45 years

(b) 47 years

(c) 49 years

(d) 42 years

(e) None of these

Directions (26-35): What should come in place of the question mark (?) in the following questions?

26. 702 ÷ 27 + 108 × 0.75 = ?

(a) 79

(b) 89

(c) 98

(d) 107

(e) 99

27. 348 × 9 × ? = 37584

(a) 11

(b) 12

(c) 14

(d) 16

(e) None of these

28. 704 × 710 + 112 × 108 = ?

(a) 499840

(b) 511936

(c) 519136

(d) 511396

(e) None of these

29. $9600 \times \frac{5}{16} \times \frac{6}{24} \times \frac{27}{6}$ = ?

(a) 3735

(b) 3575

(c) 3375

(d) 5373

(e) None of these

30. $2125 \div 85 = \sqrt{?}$

(a) 125

(b) 625

(c) 725

(d) 1225

(e) 289

31. $\frac{26}{24}$ of $408 + \frac{25}{46}$% of 41400 = ?

(a) 547

(b) 447

(c) 467

(d) 647

(e) 667

32. 636. 66 + 366.36 + 363. 33 = ?

(a) 1366.25

(b) 1636.35

(c) 1336.35

(d) 1363.25

(e) None of these

33. 3251 + 6205 + 1109 = ?

(a) 10545

(b) 11585

(c) 10565

(d) 11535

(e) None of these

34. ? ÷ 26 × 65 = 1105

(a) 424

(b) 478

(c) 456

(d) 442

(e) None of these

35. 32. 4 × 11.5 × 8.5 = ?

(a) 3149.5

(b) 3167.1

(c) 3129.1

(d) 3162.5

(e) None of these