

Section : Quantitative Aptitude

Q.1 The simple interest on a sum of ₹8,000 at a certain rate per cent per annum for 3 years is ₹3,600. What will be the amount (in ₹) of the same sum after 2 years at the same rate, if the interest is compounded 8-monthly?

- Ans**
- 1. 10,580
 - 2. 10,450
 - 3. 10,648
 - 4. 11,239

Question ID : 6549787796
Status : Answered
Chosen Option : 3

Q.2 A can complete a work in 20 days, while B can complete the same work in 25 days. Both worked together for 10 days and then C alone completed the remaining work in 10 days. In how many days will A, B and C together complete the same work?

- Ans**
- 1. 5 days
 - 2. 10 days
 - 3. 12 days
 - 4. 8 days

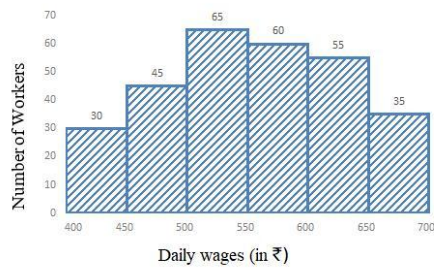
Question ID : 6549786374
Status : Answered
Chosen Option : 2

Q.3 The speed of a train is 78 km/h. It crosses a tunnel in 45 s and overtakes a person walking at a speed of 6 km/h, in the same direction, in 15 s. The length (in m) of the tunnel is:

- Ans**
- 1. 780
 - 2. 675
 - 3. 975
 - 4. 650

Question ID : 6549787789
Status : Answered
Chosen Option : 2

Q.4 Study the given graph which shows the number of workers with their daily wages and answer the question that follows.



What is the ratio of the total number of workers whose daily wages are ₹450 or above but less than ₹500 to the total number of workers whose daily wages are ₹650 or above?

- Ans**
- 1. 7 : 9
 - 2. 5 : 2
 - 3. 2 : 5
 - 4. 9 : 7

Question ID : 6549786395
 Status : Answered
 Chosen Option : 4

Q.5 The radius of a sphere is 9 cm. It is melted and drawn into a wire of radius 0.3 cm. The length of the wire is:

- Ans**
- 1. 112 m
 - 2. 118 m
 - 3. 106 m
 - 4. 108 m

Question ID : 6549786376
 Status : Answered
 Chosen Option : 4

Q.6 In $\triangle XYZ$, P is the midpoint of side XZ and Q is a point on side XY such that QZ bisects PY . If $XQ = 24$ cm, then what is the length (in cm) of QY ?

- Ans**
- 1. 18
 - 2. 12
 - 3. 6
 - 4. 8

Question ID : 6549787799
 Status : Answered
 Chosen Option : 2

Q.7

If $\cos\theta = \frac{\sqrt{3}}{2}$, then the value of $\frac{2-\sin^2\theta}{1-\cot^2\theta} + (\sec^2\theta + \operatorname{cosec}\theta)$ is:

Ans

1. $\frac{59}{24}$
 2. $-\frac{25}{12}$
 3. $-\frac{59}{24}$
 4. $\frac{25}{12}$

Question ID : 6549786392

Status : Answered

Chosen Option : 1

Q.8

Two successive discounts each of $x\%$ on the marked price of an article are equal to a single discount of ₹350. If the marked price of the article is ₹800, then the value of x is:

Ans

1. 22.5%
 2. 27.5%
 3. 20%
 4. 25%

Question ID : 6549786378

Status : Answered

Chosen Option : 2

Q.9

If $\tan x = \cot(48^\circ + 2x)$, and $0^\circ < x < 90^\circ$, then what is the value of x ?

Ans

1. 12°
 2. 16°
 3. 14°
 4. 21°

Question ID : 6549786394

Status : Answered

Chosen Option : 3

Q.10

In a circle, AB and DC are two chords. When AB and DC are produced, they meet at P. If PC = 2.8 cm, PB = 3.15 cm and AB = 3.85 cm, then CD =?

Ans

1. 7.875 cm
 2. 5.075 cm
 3. 6.975 cm
 4. 4.175 cm

Question ID : 6549786384

Status : Answered

Chosen Option : 1



Q.11 The value of

$$\frac{\tan 50^\circ + \sec 50^\circ}{\cot 40^\circ + \operatorname{cosec} 40^\circ} + \cos^2 65^\circ + \sin 65^\circ \cos 25^\circ + \tan 30^\circ \text{ is:}$$

- Ans
1. $1 + \sqrt{3}$
2. $\frac{6 + \sqrt{3}}{3}$
3. $\frac{\sqrt{3}(\sqrt{3} + 1)}{3}$
4. $2 + \sqrt{3}$

Question ID : 6549787807

Status : Answered

Chosen Option : 3

Q.12 The average height of a certain number of students in a group is 155.6 cm . If 12 students having an average height of 150.5 cm join the group and 7 students having an average height of 159 cm leave the group, the average height of the students in the group will decrease by 34 mm . What is the number of students, initially, in the group?

- Ans
1. 40
2. 30
3. 20
4. 25

Question ID : 6549787791

Status : Answered

Chosen Option : 2

Q.13 If $x + y + z = 13$, $x^2 + y^2 + z^2 = 91$ and $xz = y^2$, then the difference between z and x is:

- Ans
1. 3
2. 8
3. 5
4. 9

Question ID : 6549786388

Status : Not Answered

Chosen Option : --

Q.14 The value of $\frac{5}{4} \times 2\frac{2}{3} \div \frac{5}{9}$ of $1\frac{1}{5} + \frac{2}{25} \times 4\frac{1}{6} \div \frac{2}{7}$ of $2\frac{1}{3}$ is:

- Ans
1. $3\frac{1}{2}$
2. $2\frac{1}{2}$
3. $1\frac{1}{2}$
4. $5\frac{1}{2}$

Question ID : 6549786391

Status : Answered

Chosen Option : 4



Q.15 If $x^2 + 4y^2 + 3z^2 + \frac{19}{4} = 2\sqrt{3}(x + y + z)$, then the value of $(x - 4y + 3z)$ is:

- Ans
- 1. $\frac{\sqrt{3}}{2}$
 - 2. $\sqrt{3}$
 - 3. $2\sqrt{3}$
 - 4. $\frac{\sqrt{3}}{3}$

Question ID : 6549786389
Status : Answered
Chosen Option : 2

Q.16 The coefficient of x^3y in $(x - 2y) \times (5x + y)^3$ is:

- Ans
- 1. 250
 - 2. -150
 - 3. -175
 - 4. 75

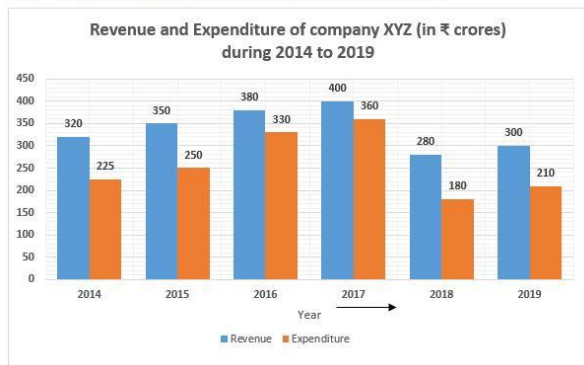
Question ID : 6549787801
Status : Answered
Chosen Option : 4

Q.17 A bag contains coins of denomination ₹1, ₹2 and ₹5 in the ratio of 4 : 5 : 8. If the total value of these coins is ₹432, then what is the number of ₹2 coins?

- Ans
- 1. 50
 - 2. 30
 - 3. 60
 - 4. 40

Question ID : 6549787795
Status : Answered
Chosen Option : 3

Q.18 Study the given graph and answer the question that follows.



The total revenue of the company in 2014, 2016 and 2018 is what percentage of the total expenditure in 2015 to 2017 and 2019 (correct to one decimal place)?

- Ans**
- 1. 85.2%
 - 2. 84.3%
 - 3. 83.4%
 - 4. 81.6%

Question ID : 6549787812
 Status : Answered
 Chosen Option : 2

Q.19 A person sold an article at a loss of 12%. Had he sold it at a gain of 10.5%, he would have got ₹112.50 more. What is the original selling price (in ₹) of the article?

- Ans**
- 1. 440.00
 - 2. 552.50
 - 3. 500.00
 - 4. 560.00

Question ID : 6549786380
 Status : Answered
 Chosen Option : 3

Q.20 The price of a commodity increases by 28%. However, the expenditure on it increases by 12%. What is the percentage increase or decrease in its consumption?

- Ans**
- 1. 12.5% Increase
 - 2. 16% Decrease
 - 3. 16% Increase
 - 4. 12.5% Decrease

Question ID : 6549787793
 Status : Answered
 Chosen Option : 2

Q.21 In an isosceles triangle ABC, $AB = AC$ and AD is perpendicular to BC. If $AD = 12$ cm and the perimeter of $\triangle ABC$ is 36 cm, then the length of BC (in cm) is:

- Ans
- 1. 12
 - 2. 5
 - 3. 13
 - 4. 10

Question ID : 6549786386
Status : Answered
Chosen Option : 4

Q.22 A chord PQ of a circle C_1 of radius 9.25 cm touches another circle C_2 that is concentric to C_1 , and the radius of C_2 is 3 cm. What is the length (in cm) of PQ ?

- Ans
- 1. 19.5
 - 2. 12
 - 3. 15
 - 4. 17.5

Question ID : 6549787797
Status : Answered
Chosen Option : 4

Q.23 The pie chart shows the money spent by Aditya through credit cards of different banks. The total money spent by him through credit cards in a year is ₹3,60,000.



How much more money was spent through Card C as compared to Card D?

- Ans
- 1. ₹1,80,000
 - 2. ₹2,000
 - 3. ₹40,000
 - 4. ₹20,000

Question ID : 6549788113
Status : Answered
Chosen Option : 4

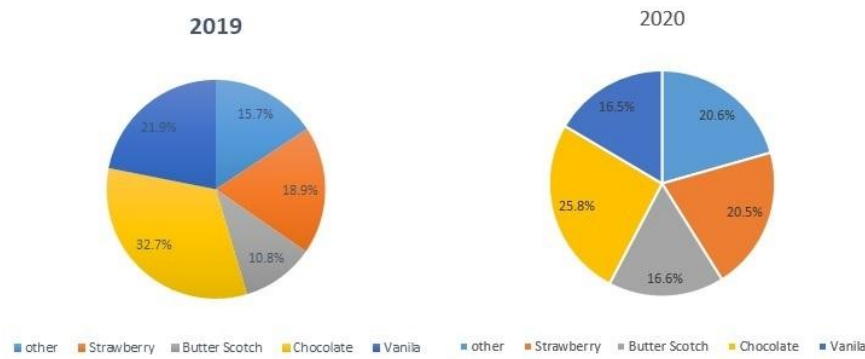
Q.24 If the five-digit number $672xy$ is divisible by 3, 7 and 11, then what is the value of $(6x + 5y)$?

- Ans
- 1. 17
 - 2. 24
 - 3. 23
 - 4. 16

Question ID : 6549787804
Status : Answered
Chosen Option : 2

Q.25 Study the given pie-charts and answer the question that follows.

The pie charts represent the popularity of ice-cream flavours among families in the years 2019 and 2020.



If 1% increase resulted in annual additional sales of ₹10,000, then how much (in ₹), did the combined Strawberry, other and Butterscotch sales increase from 2019 to 2020?

- Ans
- 1. 2,13,000
 - 2. 3,12,000
 - 3. 1,23,000
 - 4. 1,32,000

Question ID : 6549787002
Status : Not Answered
Chosen Option : --