

Section : Quantitative Aptitude(Basic Arithmetic Skill)

Q.1 A circle is centred at O. Two tangents AP and AQ are drawn from an external point A. If $\angle POQ = 118^\circ$, then $\angle PAQ$ is equal to:

- Ans**
- 1. 62°
 - 2. 112°
 - 3. 72°
 - 4. 98°

Question ID : **8161612898**
Status : **Answered**
Chosen Option : **1**

Q.2 The radius of a circular cone is 6 cm and its height is 7 cm. Then the volume of cone in cm^3 is: (Take $\pi = \frac{22}{7}$)

- Ans**
- 1. 216
 - 2. 154
 - 3. 264
 - 4. 188

Question ID : **8161612891**
Status : **Answered**
Chosen Option : **3**

Q.3 The cost price of 15 pens is equal to the selling price of 20 pens. The loss or profit percentage is:

- Ans 1. 25% loss
 2. 20% loss
 3. 25% profit
 4. 20% profit

Question ID : 8161612895
 Status : Answered
 Chosen Option : 1

Q.4 In a class, if 60% of the students are boys and the number of girls is 36, then the number of boys is:

- Ans 1. 54
 2. 60
 3. 58
 4. 65

Question ID : 8161612894
 Status : Answered
 Chosen Option : 1

Q.5 If $\cos x = \frac{p}{q}$ and $0^\circ < x < 90^\circ$, then the value of $\tan x$ is:

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

Question ID : 8161612907
 Status : Answered
 Chosen Option : 2

Q.6 In a circle, two equal and parallel chords are 6 cm apart and they lie on the opposite sides of the centre of the circle, whose radius is 5 cm. The length of each chord (in cm), is:

- Ans 1. 8
 2. 10
 3. 12
 4. 6

Question ID : 8161612899
 Status : Answered
 Chosen Option : 1

Q.7 If an amount of ₹800 is distributed between Ravi, Mohan and Govind in the proportions 2 : 5 : 3, then the sum of the shares of Mohan and Govind, is:

- Ans
- 1. ₹400
 - 2. ₹640
 - 3. ₹560
 - 4. ₹240

Question ID : 8161612896
Status : Answered
Chosen Option : 2

Q.8 If $\sin x - \cos x = 0, 0^\circ < x < 90^\circ$ then the value of $(\sec x + \operatorname{cosec} x)^2$ is:

- Ans
- 1. 10
 - 2. 4
 - 3. 8
 - 4. 6

Question ID : 8161612909
Status : Answered
Chosen Option : 3

Q.9 If 7129p465 is divisible by 9, then the value of p is:

- Ans
- 1. 4
 - 2. 3
 - 3. 0
 - 4. 2

Question ID : 8161612905
Status : Answered
Chosen Option : 4

Q.10 Mohan covers a distance of 2.5 km by scooter at the rate of 30 km/h. The time taken by Mohan to cover the given distance in minutes is:

- Ans
- 1. 10
 - 2. 6
 - 3. 8
 - 4. 5

Question ID : 8161612890
Status : Answered
Chosen Option : 4

Q.11 The given bar graph represents the pass percentage of the 10th and 12th classes of a school during the consecutive four year period 2016-2019.



What is the average of pass percentage of the 10th class for all four years?

- Ans**
- 1. 65.25%
 - 2. 63.25%
 - 3. 65.75%
 - 4. 63.75%

Question ID : **8161612910**
 Status : **Answered**
 Chosen Option : **4**

Q.12 In ΔPQR , the side QR is extended to S such that $RS = PR$. If $\angle QPS = 110^\circ$ and $\angle PRQ = 70^\circ$, then the value of $\angle PQR$ is:

- Ans**
- 1. 50°
 - 2. 40°
 - 3. 45°
 - 4. 35°

Question ID : **8161612901**
 Status : **Answered**
 Chosen Option : **4**

Q.13 In a ΔABC , $\angle ABC = 2\angle CAB$, If the side BC is extended to D and $\angle ACD = 126^\circ$, then $\angle CAB$ is:

- Ans**
- 1. 36°
 - 2. 42°
 - 3. 84°
 - 4. 63°

Question ID : **8161612900**
 Status : **Answered**
 Chosen Option : **2**

Q.14 The area of a rectangle is $a^2 - b^2$ and its length is $a + b$, what will be its breadth?

- Ans
- 1. $2ab$
 - 2. ab
 - 3. $a + b$
 - 4. $a - b$

Question ID : 8161612902
Status : Answered
Chosen Option : 3

Q.15 The average marks of Ravi in five subjects are 150, but in mathematics 43 was misread as 23 during the calculation.
The correct average is:

- Ans
- 1. 148
 - 2. 150
 - 3. 154
 - 4. 160

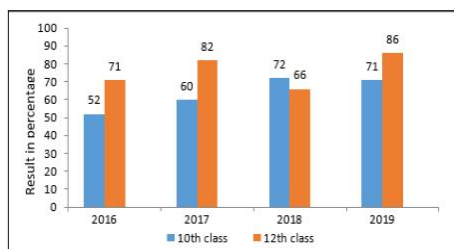
Question ID : 8161612892
Status : Answered
Chosen Option : 3

Q.16 The factors of the expression $2x^2 - 5x - 12$ are:

- Ans
- 1. $(x + 4)$ and $(2x + 3)$
 - 2. $(x + 4)$ and $(2x - 3)$
 - 3. $(x - 4)$ and $(2x - 3)$
 - 4. $(x - 4)$ and $(2x + 3)$

Question ID : 8161612903
Status : Answered
Chosen Option : 4

Q.17 The given bar graph represents the pass percentage of 10th and 12th classes of a school during the consecutive four year period 2016-2019.

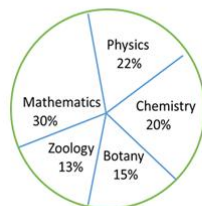


What is the average percentage of the failed students of the 12th class for all four years?

- Ans**
- 1. 23%
 - 2. 25.25%
 - 3. 25.75%
 - 4. 23.75%

Question ID : **8161612912**
 Status : **Answered**
 Chosen Option : **4**

Q.18 Study the given pie-chart and table carefully and answer the question that follows. The percentage-wise distribution of lecturers in five different subjects in a university is shown in the pie-chart. The total number of lecturers is 500.



Ratio of male to female lecturers:

Lecturers	Males : Females
Mathematics	7 : 3
Physics	2 : 3
Chemistry	4 : 1
Botany	3 : 5
Zoology	2 : 5

Find the number of male lecturers in Physics.

- Ans**
- 1. 46
 - 2. 42
 - 3. 44
 - 4. 40

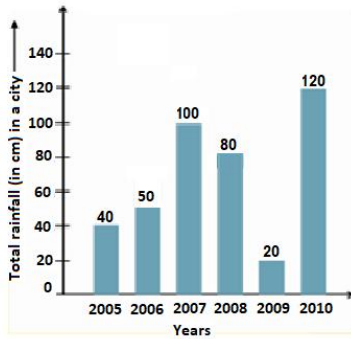
Question ID : **8161612913**
 Status : **Answered**
 Chosen Option : **3**

Q.19 The compound interest on ₹4,000 after 3 year is ₹630.50. Then the rate of interest compounded yearly is :

- Ans
- 1. 7%
 - 2. 6%
 - 3. 8%
 - 4. 5%

Question ID : 8161612897
Status : Answered
Chosen Option : 4

Q.20 The given graph represents the rainfall (in cm) in a city, over a period of six years. Study the graph and answer the question that follows.



In which two consecutive years was the difference of the rainfall minimum?

- Ans
- 1. 2006 - 2007
 - 2. 2007 - 2008
 - 3. 2008 - 2009
 - 4. 2005 - 2006

Question ID : 8161612911
Status : Answered
Chosen Option : 4

Q.21 Tap A can fill a tank in 6 hours and tap B can empty the same tank in 10 hours. If both taps are opened together, then how much time (in hours) will be taken to fill the tank?

- Ans
- 1. 20
 - 2. 15
 - 3. 18
 - 4. 16

Question ID : 8161612889
Status : Answered
Chosen Option : 2

Q.22 If a and b are two positive real numbers such that $a + b = 20$ and $ab = 4$, then the value of $a^3 + b^3$ is:

- Ans
- 1. 7760
 - 2. 8000
 - 3. 8240
 - 4. 240

Question ID : 8161612904
Status : Answered
Chosen Option : 1

Q.23 $\frac{\cos x}{1 + \sin x} + \frac{1 + \sin x}{\cos x}$ is equal to:

- Ans
- 1. $2\cos x$
 - 2. $2\operatorname{cosec} x$
 - 3. $2\sin x$
 - 4. $2\sec x$

Question ID : 8161612908
Status : Answered
Chosen Option : 4

Q.24 The value of $27 + [3(50 - 20) + 168 \div 4 + 2 - 11 \times 2]$ is :

- Ans
- 1. 149
 - 2. 239
 - 3. 245
 - 4. 139

Question ID : 8161612906
Status : Answered
Chosen Option : 4

Q.25 If the marked price of a television set is ₹24,500, then, its selling price after a 12% discount on it is:

- Ans
- 1. ₹21,460
 - 2. ₹21,640
 - 3. ₹21,650
 - 4. ₹21,560

Question ID : 8161612893
Status : Answered
Chosen Option : 4