SSC CGL (Tier - 1) Online Exam Paper - 2016 "held on 7 September 2016" Morning Shift (Quantitative Aptitude)

EXAM DATE : 7-September-2016

EXAM START TIME : 10:00:00

EXAM NAME : SSC Examination 2016

Question 51.Find the least number which must be subtracted from 18265 to make it a perfect square

Options:

1) 30

2) 38

3) 40

4) 45

Correct Answer: 40

Question 52.A and B together can do a piece of work in 36 days, B and C together can do it in 24 days. A and C together can do it in 18 days. The three working together can finish the work in

Options:

1) 8 days

2) 16 days

3) 30 days

4) 32 days

Correct Answer: 16 days

Question 53.Two adjacent sides of a parallelogram are 21 cms and 20 cms. The diagonal joining the end points of these two sides is 29 cms. The area of the parallelogram (in sq.cms) is

Options:

1) 240

2) 120

3) 210

4) 420

Correct Answer: 420

Question 54.A dealer marks his goods 20% above cost price. He then allows some discount on it and makes a profit of 8%. The rate of discount is

Options:

1) 4%

2) 6%

3) 10%

4) 12%

Correct Answer: 10%

Question 55. Sum of two numbers is thrice their difference. Their ratio is

Options:

1) 1:2

2) 2:1

3) 3:1

4) 1:3

Correct Answer: 2:1

Question 56. The average age of 36 students in a group is 14 years. When the teacher's age is included in it, the average increases by one. The teacher's age in years is

Options:

1) 31

2) 51

3) 36

4) 50

Correct Answer: 51

Question 57. A dishonest dealer professes to sell his goods at cost price but uses a weight of 875 gms for the kilogram weight. His gain in percentage is

Options:
1) 17%
2)
$14\frac{5}{7}\%$

3)
$14\frac{2}{7}\%$

4) 14%
Correct Answer:
$14\frac{2}{7}\%$

Question 58. A's salary is 50% more than that of B. Then B's salary is less than that of A by

Options:
1) 50%
2)

$33\frac{1}{3}\%c$

3)

$33\frac{1}{4}\%$

4)

$44\frac{1}{2}\%$

Correct Answer:

$33\frac{1}{3}\%c$

Question 59. Speed of a boat along and against the current are 14 kms/hr and 8 kms/hr respectively.

The speed of the current is

Options:

1) 11 kms/hr

2) 6 kms/hr

3) 5.5 kms/hr

4) 3 kms/hr

Correct Answer: 3 kms/hr

Question 60. If the simple interest on Rs. 1 for 1 month is 1 paisa, then the rate percent per annum will

be

Options:

1) 10%

2) 8%

3) 12%

4) 6%

Correct Answer: 12%

Question 61. If a/b + b/a = 1, then the value of a3 + b3 will be

Options:

1) 1

2) 0

3) -1

4) 2

Correct Answer: 0

Question 62. If p = 99, then the value of p(p2+3p+3) will be

Options:

1) 999999

2) 1000000

3) 1000001

4) 999998

Correct Answer: 999999

Question 63. If a-b=1 and a^3-b^3= 61, then the value of ab will be

Options:

1) -20

2) 20

3) 30

4) 60

Correct Answer: 20

Question 64.

If $\frac{x}{a+b} + 1 = \frac{x}{a-b} + \frac{a-b}{a+b}$, then x is equal to

Options:

1) 2a-b

2) a+b

3) a-b

4) 2a+b

Correct Answer: a-b

Question 65. The point where the 3 medians of a triangle meet is called

Options:

1) centroid

2) Incentre

3) Circumcentre

4) orthocentre

Correct Answer: centroid

Question 66. Δ ABC a right angled triangle has ∠B = 90° and AC is hypotenuse. D is its circumcentre

and AB = 3 cms, BC = 4 cms. The value of BD is

Options:

1) 3cms

2) 4 cms

3) 2.5 cms

4) 5.5 cms

Correct Answer: 2.5 cms

Question 67.Δ ABC is an equilateral triangle and D, E are midpoints of AB and BC respectively. Then the area of Δ ABC : the area of the trapezium ADEC is

Options:

1) 5:3

2) 4:1

3) 8:5

4) 4:3

Correct Answer: 4:3

Question 68.

In an isosceles triangle $ABC, AB = AC, XY||BC. If \angle A = 30°$, then $\angle BXY =$

Options:

1) 75°

2) 30°

3) 150°

4) 105°

Correct Answer: 105°

Question 69.

The value of $\sec^2 17° - \dfrac{1}{\tan^2 73°} - \sin 17° \sec 73°$ is

Options:

1) 1

2) 0

3) -1

4) 2

Correct Answer: 0

Question 70.If x=aCosθCosΦ, y = aCosθSinΦ and z= aSinθ, then the value of x2+ y2 + z2 is

Options:

1) 2a2

2) 4a2

3) 9a2

4) a2

Correct Answer: a2

Question 71.A 1.6 m tall observer is 45 meters away from a tower. The angle of elevation from his eye to the top of the tower is 30°, then the height of the tower in meters is

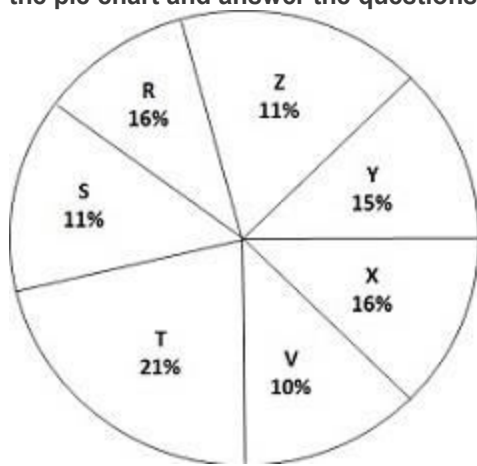**(Take √3 = 1.732)**

Options:

1) 25.98

2) 26.58

3) 27.58

4) 27.98

Correct Answer: 27.58

Question 72. The following pie chart shows proportion of population of seven villages in 2009. Study the pie chart and answer the questions that follows :

Village	% of population Below Poverty line
x	38
Y	52
Z	42
R	51
S	49
T	46
V	58

If the below poverty line population of the village 'X' is 12160, then the population of village 'S' is
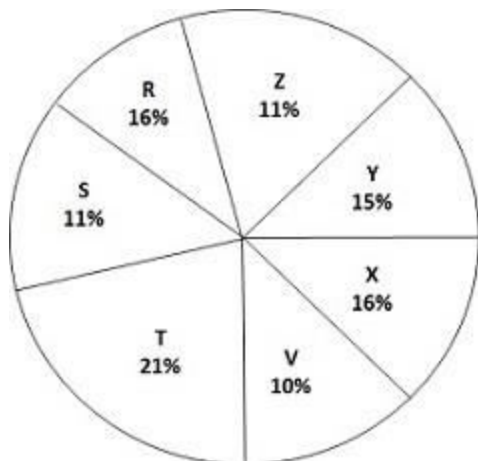
Options:

1) 18500

2) 20500

3) 22000

4) 20000

Correct Answer: 2200

Question 73. The following pie chart shows proportion of population of seven villages in 2009. Study the pie chart and answer the questions that follows :

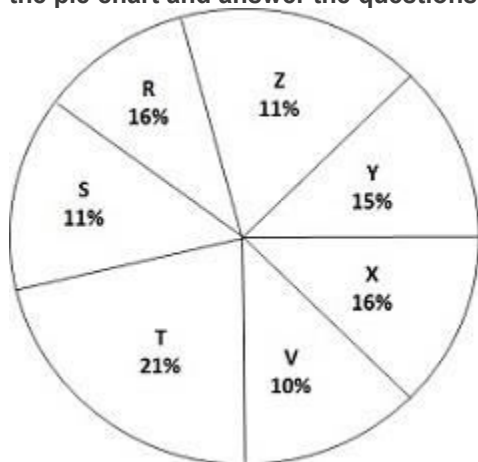| Village	% of population Below Poverty line
X	38
Y	52
Z	42
R	51
S	49
T	46
V	58

The ratio of the below poverty line population of village 'T' to that of the below poverty line population of village 'Z' is

Options:

1) 11:23

2) 13:11

3) 23:11

4) 11:13

Correct Answer: 23:11

Question 74.The following pie chart shows proportion of population of seven villages in 2009. Study the pie chart and answer the questions that follows :

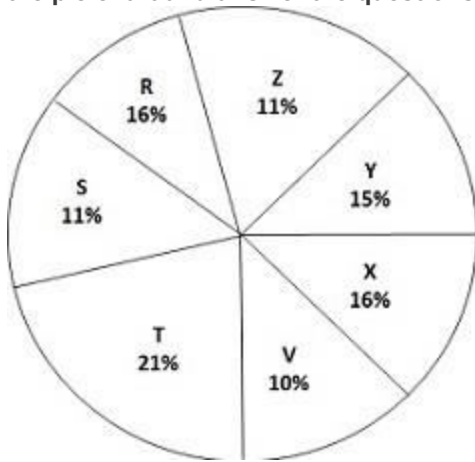| Village	% of population Below Poverty line
X	38
Y	52
Z	42
R	51
S	49
T	46
V	58

If the population of the village 'R' is 32000, then the below poverty line population of village 'Y' is

Options:

1) 14100

2) 15600

3) 16500

4) 17000

Correct Answer: 15600

Question 75. The following pie chart shows proportion of population of seven villages in 2009. Study the pie chart and answer the questions that follows :

Village	% of population Below Poverty line
X	38
Y	52
Z	42
R	51
S	49
T	46
V	58

In 2010, the population of 'Y' and 'V' increases by 10% each and the percentage of population below poverty line remains unchanged for all the villages. If in 2009, the population of village Y was 30,000, then the below poverty line population of village 'V' in 2010 is _____

Options:

1) 11250

2) 12760

3) 13140

4) 13780

Correct Answer: 12760