

Name:	Contact No:
Email ID:	Regd No:

1. A person crosses a 600 m long street in 5 minutes. What is his speed in km per hour?

- A. 3.6
- B. 7.2 According to pirate
- C. 8.4
- D. 10

Explanation:

Speed = $600 / 5 \times 60$ m/sec. = 2 m/sec. = $2 \times 18/5$ km/hr = 7.2 km/hr

2. Worker A takes 8 hours to do a job. Worker B takes 10 hours to do a job. How long should it take both A and B, working together to do the same job?

- A. $4/9$
- B. $2 \frac{4}{9}$
- C. $3 \frac{4}{9}$
- D. $4 \frac{4}{9}$

Explanation:

In this type of questions, first we need to calculate 1 hours work, then their collective work as A's 1-hour work is $1/8$

B's 1-hour work is $1/10$

(A+B)'s 1 hour work = $1/8 + 1/10 = 9/40$

So both will finish the work in $40/9$ hours = $4 \frac{4}{9}$

3. A train running at the speed of 60 km/hr crosses a pole in 9 seconds. What is the length of the train?

- A. 120 meters
- B. 180 meters
- C. 150 meters
- D. 324 meters

Explanation:

Speed = $60 \times 5/18$ m/sec = $50/3$ m/sec.

Length of the train = (Speed x Time).

Length of the train = $50/3 \times 9$ m = 150 m.

4. A mixture contains alcohol and water in the ratio 4:3. If 5 liters of water is added to the mixture, the ratio becomes 4: 5. Find the quantity of alcohol in the given mixture.

- A. 10
- B. 12
- C. 15
- D. 18

Explanation:

Let the quantity of alcohol and water be $4x$ litres and $3x$ litres respectively

$4x / (3x + 5) = 4/5$

$20x = 4(3x + 5)$

$8x = 20$

$x = 2.5$

Quantity of alcohol = (4×2.5) litres = 10 litres.

5. In 100 m race, A covers the distance in 36 seconds and B in 45 seconds. In this race A beats B by:

- A. 20m
- B. 25m
- C. 22.5m
- D. 9m

Explanation:

Distance covered by B in 9 sec. = $(100/45) \times 9\text{m} = 20\text{m}$

A beats B by 20 meters.

6. Pointing to a girl in the photograph, Ajay said, "Her mother's brother is the only son of my mother's father." How is the girl's mother related to Ajay?

- A. Mother
- B. Sister
- C. Aunt
- D. Grandmother

Explanation:

Only son of Ajay's mother's father -- Ajay's maternal uncle.

So, the girl's maternal uncle is Ajay's maternal uncle.

Thus, the girl's mother is Ajay's aunt.

7. A is B's sister. C is B's mother. D is C's father. E is D's mother. Then, how is A related to D?

- A. Grandfather
- B. Grandmother
- C. Daughter
- D. Granddaughter

Explanation:

A is the sister of B and B is the daughter of C. So, A is the daughter of C. Also, D is the father of C. So, A is the granddaughter of D.

8. While calculating the weight of a group of men, the weight of 63 kg of one of the member was mistakenly written as 83 kg. Due to this the average of the weights increased by half kg. What is the number of men in the group?

- A. 25
- B. 20
- C. 40
- D. 60

Answer – C. 40

Explanation:

Increase in marks lead to an increase in average by $1/2$

So $(83-63) = x/2$

$x = 40$

Therefore, the number of men in the group are 40

9. A Boat takes 128 min less to travel to 48 Km downstream than to travel the same distance upstream. If the speed of the stream is 3 Km/hr. Then Speed of Boat in still water is?

- A. 12 Km/hr
- B. 15 Km/hr

C. 6 Km/hr

D. 9 Km/hr

Answer – A. 12 Km/hr

Explanation:

$$32/15 = 48(1/s-3 - 1/s+3)$$

$$s = 12$$

Therefore, Speed of Boat in still water is 12 Km/hr.

10. Shas married 8 year ago. Today her age is 9/7 times to that time of marriage. At present his son's age is 1/6th of her age. What was her son's age 3 year ago?

A. 4 yr

B. 2 yr

C. 3 yr

D. 5 yr

Answer – B. 2 yr

Explanation:

Let us assume that Sravan's age 8 year ago = x

Present age = x + 8

$$x + 8 = 9/7 x$$

$$7(x + 8) = 9x$$

$$x = 28; 28 + 8 = 36$$

$$\text{Son's age} = 1/6 * 36 = 6$$

$$\text{Son's age 4 year ago} = 6 - 4 = 2$$

Direction (Q. 11 – 15): Choose the Synonyms of the following words

11. **Receptacle**

A. Recrudesce

B. Decline

C. Definiteness

D. Container

Answer – D. Container

Explanation: Receptacle – a hollow object used to contain something.

12. **Cupidity**

A. Discount

B. Oblivious

C. Greed

D. Commend

Answer – C. Greed

Explanation: Cupidity – greed for money or possessions.

13. **Pallid**

A. Overpass

B. Disdain

C. Revulsion

D. Pale

Answer – D. Pale

Explanation: Pallid – (of a person's face) pale, typically because of poor health

14. Irrepressible

- A. Irresistible
- B. Languid
- C. Dictate
- D. Acclaim

Answer – A. Irresistible

Explanation: Irresistible – too attractive and tempting to be resisted.

15. Infringe

- A. Encroach
- B. Timid
- C. Concur
- D. Expel

Answer – A. Encroach

Explanation: Encroach – intrude on (a person's territory, rights, personal life, etc.).

16. Identify the error sentence

- A. the stars, let me see what spring is
- B. like, on Jupiter and Mars" sang
- C. Fly me to the moon, let me play between
- D. No error.

Answer – C. Fly me to the moon, let me play between

Explanation: The correct sentence is, Fly me to the moon, let me play among

17. Identify the error sentence

- A. probability-oriented environment of roll
- B. The interaction with the game is still very
- C. tactile thanks to the board set-up and the
- D. No error.

Answer – A. probability-oriented environment of roll

Explanation: Correct sentence is, the probability-oriented environment of rolling

Direction (Q. 11 – 14): Fill in the Blanks. Choose the correct word which makes the sentence meaningful

18. Until a few years ago, the toss-up for the city's commuters was between overcrowded city buses and _____, sometimes-greedy autorickshaw drivers.

- A. stunning
- B. usual
- C. eccentric
- D. horrible

Answer – C. eccentric

Explanation: eccentric – unusual

19. The bench also struck down the 99th Constitution Amendment Act, which was passed _____ by both Houses of Parliament.

- A. rimation
- B. publicly

- C. unanimously
- D. conjunctively

Answer – C. unanimously

Explanation: unanimously – with the agreement

20. Even after 10 years of the RTI, I find a widespread lack of _____.

- A. ingratiating,
- B. inviting
- C. cognizance
- D. misunderstanding

Answer – C. cognizance

Explanation: cognizance – awareness

Arrange the words given below in a meaningful sequence.

21. Presentation 2. Recommendation 3. Arrival 4. Discussion 5. Introduction

☐ A) 5, 3, 4, 1, 2

☐ B) 3, 5, 4, 2, 1

☐ C) 3, 5, 1, 4, 2

☐ D) 5, 3, 1, 2, 4

Answer: C) 3, 5, 1, 4, 2

Explanation:

The correct order is:

Arrival Introduction Presentation Discussion Recommendation

22. A and B invest in a business in the ratio 3: 2. If 5% of the total profit goes to charity and A's share is Rs. 855, the total profit is:

☐ A) 500

☐ B) 1000

☐ C) 1500

☐ D) 2000

Answer: C) 1500

Explanation:

Let the total profit be Rs. 100.

After paying to charity, A's share = $(95 \times \frac{3}{5}) = \text{Rs. } 57$.

If A's share is Rs. 57, total profit = Rs. 100.

If A's share is Rs. 855, total profit = $(100/57 \times 855) = 1500$.

23. In an election between two candidates, one got 55% of the total valid votes, 20% of the votes were invalid. If the total number of votes was 7500, the number of valid votes that the other candidate got, was:

- ☐ A) 2500 ☐ B) 2700
☐ C) 2900 ☐ D) 3100

Answer: B) 2700

Explanation:

Total number of votes = 7500

Given that 20% of Percentage votes were invalid

=> Valid votes = 80%

Total valid votes = $7500 * (80/100)$

1st candidate got 55% of the total valid votes.

Hence the 2nd candidate should have got 45% of the total valid votes

=> Valid votes that 2nd candidate got = total valid votes x $(45/100)$

$7500 * (80/100) * (45/100) = 2700$

24. Two numbers are respectively 20% and 50% more than a third number. The ratio of the two numbers is:

- ☐ A) 2:5 ☐ B) 3:5
☐ C) 4:5 ☐ D) 5:4

Answer: C) 4:5

Explanation:

25. In a certain code language COMPUTER is written as RFUVQNPC. How will MEDICINE be written in that code language?

- ☐ A) MFEDJJOE ☐ B) EOJDEJFM
☐ C) MFEJDJOE ☐ D) EOJDJEFM

Let the third number be x .

Then, first number = 120% of $x = 120x/100 = 6x/5$

Second number = 150% of $x = 150x/100 = 3x/2$

Ratio of first two numbers = $6x/5 : 3x/2 = 12x : 15x = 4 : 5$

26. Tickets numbered 1 to 20 are mixed up and then a ticket is drawn at random. What is the probability that the ticket drawn has a number which is a multiple of 3 or 5?

☐ A) $1/2$

☐ B) $3/5$

☐ C) $9/20$

☐ D) $8/15$

Answer: C) $9/20$

Explanation:

Here, $S = \{1, 2, 3, 4, \dots, 19, 20\}$.

Let E = event of getting a multiple of 3 or 5 = $\{3, 6, 9, 12, 15, 18, 5, 10, 20\}$. $P(E) = n(E)/n(S) = 9/20$.

27. 8 liters are drawn from a cask full of wine and is then filled with water. This operation is performed three more times. The ratio of the quantity of wine now left in cask to that of the water is 16: 65. How much wine the cask holds originally?

☐ A) 18 liters

☐ B) 24 liters

☐ C) 32 liters

☐ D) 42 liters

Answer: B) 24 liters

Explanation:

Let the quantity of the wine in the cask originally be x liters

Then, quantity of wine left in cask after 4 operations = $[x(1-8x/4)] \times 1-8x/4$ litres

$$\therefore [x(1-8x/4)] \times 1-8x/4 = 16/65x$$

$$\Rightarrow [1-8x/4]^4 = 16/65 \Rightarrow 1-8x/4 = \sqrt[4]{16/65}$$

$$\Rightarrow x = 24$$

28. A trader mixes 26 kg of rice at Rs. 20 per kg with 30 kg of rice of other variety at Rs. 36 per kg and sells the mixture at Rs. 30 per kg. His profit percent is:

☐ A) No profit, no loss

☐ B) 5%

☐ C) 8%

☐ D) 10%

Answer: B) 5%

Explanation:

C.P. of 56 kg rice = Rs. $(26 \times 20 + 30 \times 36)$ = Rs. $(520 + 1080)$ = Rs. 1600.

S.P. of 56 kg rice = Rs. (56×30) = Rs. 1680.

Gain = $(80/1600 \times 100)\%$ = 5%

29. Salaries of Ravi and Sumit are in the ratio 2:3. If the salary of each is increased by Rs. 4000, the new ratio becomes 40:57. What is Sumit's salary?

☐ A) 38000

☐ B) 46800

☐ C) 36700

☐ D) 50000

Answer: A) 38000

Explanation:

Let the original salaries of Ravi and Sumit be Rs. $2x$ and Rs. $3x$ respectively.

Then,

$$(2x+4000) / (3x+4000) = 40 / 57$$

$$\Rightarrow 57 \times (2x + 4000) = 40 \times (3x + 4000)$$

$$\Rightarrow 6x = 68,000$$

$$\Rightarrow 3x = 34,000$$

$$\text{Sumit's present salary} = (3x + 4000) = \text{Rs. } (34000 + 4000) = \text{Rs. } 38,000$$

30. A bag contains 6 white, and 4 black balls .2 balls are drawn at random. Find the probability that they are of same color.

☐ A) $1/2$

☐ B) $7/15$

☐ C) $8/15$

☐ D) $1/9$

Answer: B) $7/15$

Explanation:

Let S be the sample space

$$\text{Then } n(S) = \text{no of ways of drawing 2 balls out of } (6+4) = {}^{10}C_2 = 10 \times 9 / 2 = 45$$

Let E = event of getting both balls of same colour

Then, $n(E)$ = no of ways (2 balls out of six) or (2 balls out of 4)

$$= {}^6C_2 + {}^4C_2 = 6 \times 5 / 2 + 4 \times 3 / 2 = 15 + 6 = 21$$

$$\text{Therefore, } P(E) = n(E)/n(S) = 21/45 = 7/15$$

31. Which of the following fractions is greater than $3/4$ and less than $5/6$?

- ☐ A) 3 / 5 ☐ B) 4 / 5
- ☐ C) 7 / 5 ☐ D) 9 / 5

Answer: B) 4 / 5

Explanation:

$3/4 = 0.75$, $5/6 = 0.833$, $1/2 = .5$, $2/3 = 0.66$, $4/5 = 0.8$, $9/10 = 0.9$.
clearly 0.8 lies between 0.75 and .833.
 $4/5$ lies between $3/4$ and $5/6$..

32. A man took loan from a bank at the rate of 12% p.a. simple interest. After 3 years he had to pay Rs. 5400 interest only for the period. The principal amount borrowed by him was:

- ☐ A) Rs.2000 ☐ B) Rs.10000
- ☐ C) Rs.15000 ☐ D) Rs.20000

Answer: C) Rs.15000

Explanation:

Principal = $\text{Rs}(100 \times 5400 \div 12 \times 3) = \text{Rs. } 15000$

33. An Informal Gathering occurs when a group of people get together in a casual, relaxed manner.

Which situation below is the best example of an Informal Gathering?

- A. A debating club meets on the first Sunday morning of every month.
B. After finding out about his salary raise, Jay and a few colleagues go out for a quick dinner after work.
C. Meena sends out 10 invitations for a bachelorette party she is giving for her elder sister.
D. Whenever she eats at a Chinese restaurant, Roop seems to run into Dibya.

Answer: B.

34. CUP : LIP :: BIRD : ?

- A. GRASS
B. FOREST
C. BEAK
D. BUSH

Answer: C. BEAK. You drink out of a cup with your lips. Similarly, birds bite grass with their beaks.

35. Look at this series: 80, 10, 70, 15, 60, ... What number should come next?

- A. 20
B. 25
C. 30
D. 50

Answer: Option A. This is an alternating addition and subtraction series. In the first pattern, 10 is



subtracted from each number to arrive at the next. In the second, 5 is added to each number to arrive at the next.