

1 viii Maths
Multiple Choice Questions (MCQs)
(for 2nd Term)
CLASS: VIII
SUBJECT: MATHEMATICS

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Chapter – 8

- Question 1) A man buys an article for Rs.27.50 and sells it for Rs.28.60. Find his gain percent.
(a) 1% (b) 2% (c) 3% (d) 4%
- Question 2) A TV is purchased at Rs.5000 and sold at Rs.4000, find the loss percent
(a) 10% (b) 20% (c) 25% (d) 28%
- Question 3) In terms of percentage profit, which among following the best transaction
(a) C.P 40, Profit 19 (b) C.P 50, Profit 24 (c) C.P 40, Profit 19 (d) C.P 60, Profit 29
- Question 4) A person incurs a loss of 5% on selling a watch for Rs.1140. At what price should be sold to earn 5% profit.
(a) Rs.1200 (b) Rs.1230 (c) Rs.1260 (d) Rs.1290
- Question 5) A book was sold for Rs.27.50 with a profit of 10%. If it were sold for Rs. 25.75, then what would have been percentage of profit or loss?
(a) 2% Profit (b) 3% Profit (c) 2% Loss (d) 3% Loss
- Question 6) Alfred buys an old scooter for Rs.4700 and spends Rs.800 on its repairs. If he sells the scooter for Rs.5800, his gain% is
(a) $5\frac{5}{11}\%$ (b) $6\frac{6}{11}\%$ (c) $7\frac{8}{12}\%$ (d) 9%
- Question 7) If the C.P is 25% of S.P. then what is the profit percent.
(a) 150% (b) 200% (c) 300% (d) 350%
- Question 8) The C.P of 20 articles is the same as the S.P of x articles. If the profit is 25%, find out the value of x
(a) 13 (b) 14 (c) 15 (d) 16
- Question 9) Akhil purchased 70kg vegetable at Rs.420, then sold them at the rate of Rs.6.50 per kg, find the profit percent.
(a) 15% (b) 12.5% (c) 14% (d) 18%
- Question 10) 100 oranges are bought at the rate of Rs.350 and sold at the rate of 48 per dozen, the percentage of profit is
(a) $\frac{100}{7}\%$ (b) 20% (c) 33% (d) 14%
- Question 11) A man buys an item at Rs.1200 and sells it at the loss of 20 percent then what is the S.P of that item
(a) Rs.660 (b) Rs.760 (c) Rs.860 (d) Rs.960
- Question 12) A shopkeeper expects a gain of 22.5% on his C.P. If his sale was Rs.392, then find his profit.
(a) Rs.70 (b) Rs.72 (c) Rs.74 (d) Rs.76
- Question 13) A plot is sold for Rs.18,700 with a loss of 15%. At what price it should be sold to get profit of 15%
(a) Rs.25300 (b) Rs.22300 (c) Rs.24300 (d) Rs.21300
- Question 14) A shopkeeper sells a transistor at Rs.840 at a gain of 20% and another for Rs.960 at the loss of 4%. Find his total gain percent
- Question 15) A man gains 20% by selling an article for a certain price. If he sells it at double the price, the percentage of profit will be
(a) 130% (b) 140% (c) 150% (d) 160%
- Question 16) If the C.P of 12 pens is equal to the selling price of 8 pens, the gain percent is
(a) 12% (b) 30% (c) 50% (d) 60%
- Question 17) The C.P of 20 articles is the same as the selling price of x articles. If the profit is 25% then determine the value of x
(a) 14 (b) 15 (c) 16 (d) 17
- Question 18) If the C.P of 12 items is equal to the S.P of 16 items, the loss percent is
(a) 20% (b) 25% (c) 30% (d) 35%
- Question 19) A man bought an article and sold it at a gain of 5%. If he had bought it at 5% less and sold it for Rs.1 less he would have made a profit of 10% the C.P of the article was.
(a) Rs.100 (b) Rs.150 (c) Rs.200 (d) Rs.250
- Question 20) A fruit seller sells mangoes at the rate of Rs.9 per kg and thereby loses 20%. At what price per kg, he should have sold them to make a profit of 5%
(a) Rs.8.81 (b) Rs.9.81 (c) Rs.10.81 (d) Rs.11.81
- Question 21) If the manufacturer gains 10%, the wholesale dealer 15% and the retailer 25%, then find the cost of production of a table if the retail price was Rs.1265
(a) Rs.750 (b) Rs.800 (c) Rs.850 (d) Rs.900
- Question 22) A producer of tea blends two varieties of tea from two tea gardens one costing Rs.18 per kg and another Rs.20 per kg in the ratio 5:3. If he sells the blended variety at Rs.21 per kg, then his gain percent is
(a) 12% (b) 13% (c) 14% (d) 15%
- Question 23) A shopkeeper sold an article for Rs. 2564.36 approximately what was his profit percent if the cost price of the article was Rs.2400.
(a) 4% (b) 5% (c) 6% (d) 7%
- Question 24) A shopkeeper cheats to the extent of 10% while buying and selling, by using false weights. His total gain.
(a) 10% (b) 21% (c) 22% (d) 23%

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Chapter – 9

- Question 1) Find the compound interest on Rs.7500 at 4% per annum for 2 years, compounded annually
(a) Rs.610 (b) Rs.612 (c) Rs.614 (d) Rs.616
- Question 2) Albert invested amount of Rs.8000 in a fixed deposit for 2 years at compound interest at the rate of 5% p.a. How much will Albert get on the maturity of fixed deposit.
(a) Rs.8510 (b) Rs.8620 (c) Rs.8730 (d) Rs.8820
- Question 3) What will be the compound interest on Rs.25000 after 3 years at the rate of 12% per annum.
(a) Rs.10123.2 (b) Rs.10123.3 (c) Rs.10123.4 (d) Rs.10123.5
- Question 4) A man saves Rs.200 at the end of each year and lends the money at 5% p.a. compound interest. How much will it become at the end of 3 years.
(a) Rs.662 (b) Rs.662.01 (c) Rs.662.02 (d) Rs.662.03
- Question 5) Find the compound interest on Rs.7500 at 4% p.a. for 2 years compounded annually.
(a) Rs.312 (b) Rs.412 (c) Rs.512 (d) Rs.612
- Question 6) Find the compound interest on Rs.16,000 at 20% per annum for 9 months, compounded quarterly
(a) Rs.2520 (b) Rs.2521 (c) Rs.2512 (d) Rs.2513
- Question 7) A sum of Rs.1600 gives a simple interest of Rs.252 in 2 years 3 months. What is the rate of interest per annum?
(a) 5% (b) 6% (c) 7% (d) 8%
- Question 8) In what time will the simple interest be $\frac{2}{5}$ of the principal at 8% per annum?
(a) 2 Years (b) 3 Years (c) 5 Years (d) 7 years
- Question 9) At what rate percent per annum simple interest will a sum of money triple itself in 25 Years?
(a) 5% (b) 6% (c) 7% (d) 8%
- Question 10) A man lent Rs.60,000 partly at 5% and the rest at 4% simple interest. If the total annual interest is Rs.2560, what was the amount lent at 4%?
(a) Rs.41,000 (b) Rs.43,000 (c) Rs.44,000 (d) Rs.46,000
- Question 11) Rs.6000 becomes Rs.7200 in 4 years at a certain rate of simple interest. If the rate becomes 1.5 times of itself, what will be the same principal amount in 5 years at this new rate of interest?
(a) Rs.6250 (b) Rs.7250 (c) Rs.6350 (d) Rs.8250
- Question 12) Ravi deposited Rs.5000 in the bank. The bank offered simple interest at the rate of 12 percent per annum. What is the total amount received by him at the end of 5 years?
(a) Rs.5000 (b) Rs.8000 (c) Rs.9000 (d) Rs.6000
- Question 13) Find the compound interest payable on Rs.1200 at 6% per annum at the end of 2 years, compounded annually.
(a) Rs.147.82 (b) Rs.841.32 (c) Rs.148.32 (d) Rs.138.42
- Question 14) Find the compound interest on a sum of Rs.8000 at 10% p.a. for 2 years, compounded annually.
(a) Rs.8690 (b) Rs.9680 (c) Rs.9860 (d) Rs.9068
- Question 15) Find the compound interest for 2 years, compounded annually, if the rate for first year is 6% p.a. and for second year is 8% p.a.
(a) Rs.1884 (b) Rs.1484 (c) Rs.1448 (d) Rs.1488
- Question 16) What would be the compound interest obtained on amount of Rs.20,000 at the rate of 15% p.a. after 3 years.
(a) Rs.10714.50 (b) Rs.10,417.50 (c) Rs.10,741.50 (d) None
- Question 17) A sum of Rs.12,000 is invested for 3 years compounded at 5%, 10% and 20% respectively, find the amount and compound interest at the end of 3 years
(a) Rs.4632 (b) Rs.4236 (c) Rs.4623 (d) Rs.4322
- Question 18) What is the compound interest on Rs.1600 at 20%p.a. for $1\frac{1}{2}$ years, compound half yearly
(a) Rs.592.6 (b) Rs.529.6 (c) Rs.569.2 (d) Rs.565.2
- Question 19) Find the amount and compound interest on Rs.8000 at 16% p.a. for 9 months, when compounded quarterly
(a) Rs.998 approx (b) Rs.999 approx (c) Rs.1000 approx (d) Rs.995 approx
- Question 20) Sita deposited Rs.5000 at 10% s.i. for 2 years. What will be compound interest of 2 years if compound half yearly
(a) Rs.53.77 (b) Rs.77.53 (c) Rs.37.57 (d) Rs.55.73
- Question 21) Appreciation becomes when value of an article
(a) increases (b) decreases (c) remains constant (d) none
- Question 22) Depreciation becomes when value of an article
(a) increases (b) decreases (c) remains constant (d) none
- Question 23) Formula for compound interest is
(a) $\frac{P \times R \times T}{100}$ (b) $A = P \left(1 + \frac{r}{100}\right)^n$ (c) $\left[\left(1 + \frac{R}{100}\right)\right]^n - 1$ (d) none
- Question 24) Formula for amount when compounded half yearly is
(a) $A = P \left(1 + \frac{r}{100}\right)^n$ (b) $A = P \left(1 + \frac{r}{100}\right)^{2n}$ (c) $A = P \left(1 + \frac{r}{200}\right)^{2n}$ (d) none
- Question 25) Formula for amount when compounded quarterly is
(a) $A = P \left(1 + \frac{4r}{100}\right)^{4n}$ (b) $A = P \left(1 + \frac{r}{400}\right)^n$ (c) $A = P \left(1 + \frac{r}{800}\right)^{4n}$ (d) $A = P \left(1 + \frac{r}{400}\right)^{4n}$

- Question 1) Expansion of $(x+3y)(x-y)$ gives
(a) $x^2+2xy-3y^2$ (b) $x+3y-2xy$ (c) $-2y+3x$ (d) $3y-42x$
- Question 2) $9a^2 - 4$ gives
(a) $(3a+2)(3a-2)$ (b) $9a+12$ (c) $(4a+13)(4a-13)$ (d) $54a-32$
- Question 3) Factorise $x^2+8x+12$
(a) $(x+2)(x+6)$ (b) $(x+3)(x+4)$ (c) $3x+12$ (d) $3x-12$
- Question 4) If $x=3$ is a solution of $x^2+6x+15$, value of k is
(a) $k=-8, x=5$ (b) $k=8, x=3$ (c) $k=6, x=5$ (d) none of above
- Question 5) Expansion of $2x(x+2y) + 3x(2x-3y)$
(a) $8x^2-5xy$ (b) $8x-5y$ (c) $3y-2y$ (d) none of above
- Question 6) Two positive numbers differ by 5 and square of their sum is 169 are.
(a) 2,4 (b) 5,6 (c) 4,9 (d) 3,7
- Question 7) Factorize $2x^2y^2+5xy-12$
(a) $3xy-12x+9y$ (b) $(2xy-3)(xy+2)$ (c) $5b-4a$ (d) none of above
- Question 8) 39^2+78+1 using algebraic identities is
(a) 1200 (b) 1700 (c) 500 (d) 1600
- Question 9) Whole number such that twice of its square added to itself gives to
(a) 5 (b) 2 (c) 8 (d) 10
- Question 10) Expansion and simplification of $8(3x-4) + 5(x-2)$ gives
(a) $24x-37$ (b) $36-4x$ (c) $29x-42$ (d) $38+42x$
- Question 11) Factorization of 103^2-9 yields
(a) 10300 (b) 10600 (c) 11250 (d) 12500
- Question 12) $(a+b)^2$ gives
(a) a^2-b^2 (b) $a^2+2ab+b^2$ (c) $a+2b$ (d) $a-2b$
- Question 13) Expansion of $-8(3a+5b)$ yields.
(a) $-24a-40b$ (b) $-22a+80b$ (c) $20a-30b$ (d) $-24a-41b$
- Question 14) Perimeter of rectangle is 20cm and area is 24cm^2 length and breadth are
(a) 6cm and 4cm (b) 8cm and 6cm (c) 12cm and 10cm (d) 7cm and 5cm
- Question 15) Factorize $(-4n^2+81)$
(a) $(9+3n)(9-3n)$ (b) $(6-45n)$ (c) $(9+2n)(9-2n)$ (d) $(2n+9)(2n-9)$
- Question 16) Factorisation of $4x-20$ yields
(a) $2x-4$ (b) $4(x-5)$ (c) $5(x-4)$ (d) $20x$
- Question 17) Factorisation of $x+xy+2y+2y+2y^2$ gives
(a) x^2+2xy (b) $x+y$ (c) $(1+y)(x+2y)$ (d) none of above
- Question 18) Which of the following is the common factor of $21x^2y$ and $35xy^2$?
(a) 7 (b) xy (c) x^2 (d) none of these
- Question 19) $(a+2b)^2 - (a+2b)(3a-7b)$ by factorization gives
(a) $(a+2b)(9b-2a)$ (b) $a-3b+4ab$ (c) $5b-4a$ (d) none of above
- Question 20) Factorization of $4x-20$ yields
(a) $2x-4$ (b) $4(x-5)$ (c) $5(x-4)$ (d) $20x$
- Question 21) Factorization of $x+xy+2y+2y^2$ gives
(a) x^2+2xy (b) $x+y$ (c) $(1+y)(x+2y)$ (d) none of these
- Question 22) $25a^2 - 64b^2$
(a) $(25a+64b)(25a-64b)$ (b) $(2a+6b)(2a-6b)$ (c) $(5a+8b)(5a-8b)$ (d) $(8a+5b)(8a-5b)$
- Question 23) $(a+b)(a-b)$ is.
(a) a^2+b^2 (b) b^2-a^2 (c) a^2-b^2 (d) a^2+b^2+2ab
- Question 24) $x^2 + \dots + y^2 = (x+y)^2$
(a) xy (b) $3xy$ (c) $2xy$ (d) $5xy$
- Question 25) Value of $10^2 - 5^2$.
(a) 75 (b) 25 (c) 35 (d) 65

Chapter – 15

- Question 1) The number of solution of the pair of linear equations $x+2y-8=0$ and $2x+4y=16$ is
(a) 0 (b) 1 (c) infinite (d) none
- Question 2) What do we get when we transpose $\frac{5}{2}$ to R.H.S in the equation $\frac{x}{4} = \frac{5}{2} = \frac{-3}{3}$?
(a) $\frac{x}{4} = \frac{-3}{4} + \frac{5}{2}$ (b) $\frac{x}{4} = \frac{-5}{2} + \frac{3}{4}$ (c) $\frac{x}{4} = \frac{-3}{4} + \left(-\frac{5}{2}\right)$ (d) None of these
- Question 3) In the equation $3x=4-x$, transposing $-x$ to LHS we get
(a) $3x-x=4$ (b) $3x+x=4$ (c) $-3x+x=4$ (d) $-3x-x=4$
- Question 4) If $\frac{x}{3} + 1 = \frac{7}{15}$, then which of the following is correct?
(a) $\frac{x}{3} = \frac{7}{15} - 1$ (b) $\frac{x}{3} = \frac{-7}{15} + 1$ (c) $\frac{x}{3} = \frac{-7}{15} - 1$ (d) None
- Question 5) If $7x+15=50$, then which of the following is the root of the equation?
(a) -5 (b) $\frac{65}{7}$ (c) 5 (d) $\frac{1}{5}$
- Question 6) If $\frac{2x}{5} = 4$, the value of x is
(a) 10 (b) -10 (c) $\frac{-8}{5}$ (d) $\frac{8}{5}$
- Question 7) If the sum of two consecutive numbers is 71 and one number is x , then the other number is
(a) $x+(x+1) = 74$ (b) $x+(x+2) = 71$ (c) $x+x=71$ (d) None
- Question 8) Two years ago my age was x years then what was my age 5 years ago?
(a) $x+7$ (b) $x-2-5$ (c) $x-5$ (d) $x-3$
- Question 9) How old will I be after 10 years, if my age before 10 years was ' x ' years?
(a) $x+20$ (b) $x-20$ (c) $x+10$ (d) $x-10$

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- Question 10) If the difference of two consecutive number is 15 and greater of them is x then the smaller number is
 (a) 16 (b) 14 (c) 8 (d) 7
- Question 11) If x is even number, which is the next odd number.
 (a) x+1 (b) x+2 (c) x-1 (d) x-2
- Question 12) If $8x-3 = 25+17x$, then x is
 (a) fraction (b) an integer (c) a rational number (d) cannot be solved
- Question 13) The shifting of a number from one side of an equation to other is called
 (a) transposition (b) distributivity (c) commutativity (d) Associativity
- Question 14) If $\frac{5x}{3} - 4 = \frac{2x}{5}$ then the numerical value of $2x-7$ is
 (a) $\frac{19}{13}$ (b) $\frac{13}{19}$ (c) 0 (d) $\frac{13}{19}$
- Question 15) The value of x for which the expressions $3x-4$ and $2x+1$ becomes equal is
 (a) -3 (b) 0 (c) 5 (d) 1
- Question 16) If a & b are positive integers, then the solution of the equation $ax = y$ has to be always
 (a) positive (b) negative (c) one (d) zero
- Question 17) Linear equation in one variable has
 (a) only one variable with any power. (b) only one term with a variable
 (c) only one variable with power 1 (d) only constant term
- Question 18) Which of the following is a linear expression
 (a) x^2+1 (b) $y+y^2$ (c) 4 (d) $1+2$
- Question 19) Value of S in $\frac{1}{3} + S = \frac{2}{5}$
 (a) $\frac{4}{5}$ (b) $\frac{1}{15}$ (c) 10 (d) 0
- Question 20) $\frac{-4}{3} y = \frac{3}{4}$, then y =
 (a) $-\left(\frac{3}{4}\right)^2$ (b) $-\left(\frac{4}{3}\right)^2$ (c) $\left(\frac{3}{4}\right)^2$ (d) $\left(\frac{4}{3}\right)^2$
- Question 21) $\frac{-4}{3} y = \frac{-3}{4}$, then y =
 (a) $-\left(\frac{3}{4}\right)^2$ (b) $-\left(\frac{4}{3}\right)^2$ (c) $\left(\frac{3}{4}\right)^2$ (d) $-\left(\frac{4}{3}\right)^2$
- Question 22) The sum of 3 consecutive multiples of 7 is 357. Find the smallest multiple
 (a) 112 (b) 126 (c) 119 (d) 116
- Question 23) Arpita's present age is thrice of Shilpa. If Shilpa's age three years ago was x then Arpita's present age is
 (a) $3(x-3)$ (b) $3x+3$ (c) $3x-9$ (d) $3(x+3)$
- Question 24) The solution of the equation $ax+b=0$ is
 (a) $x = \frac{a}{b}$ (b) $x = -b$ (c) $x = -\frac{b}{a}$ (d) $x = \frac{b}{a}$
- Question 25) The value of x for which the expressions $3x-4$ and $2x+1$ become equal is
 (a) -3 (b) 0 (c) 5 (d) 1

Chapter – 16

- Question 1) The number of solutions in the pair of linear equation is
 (a) 2 (b) 3 (c) 5 (d) 1
- Question 2) If $-5 > a$ & $a > b$ then -5 is
 (a) Less than a (b) greater than b (c) greater than a (d) less than b
- Question 3) By solving the inequality $6x-7>5$, the answer will be
 (a) $x>6$ (b) $x<5$ (c) $x<7$ (d) $x>2$
- Question 4) By solving the inequality $3(a-b) < 4+a$, the answer will be
 (a) $a < 9$ (b) $a < 12$ (c) $a < 13$ (d) $a < 11$
- Question 5) By solving the inequality $\frac{1}{3} (x-3) > \frac{1}{2} (x+2)$, the answer will be
 (a) $x < -10$ (b) $x < -12$ (c) $x < -14$ (d) $x < -15$
- Question 6) Mary scored 200 marks in three tests. If average score of 60 is required then the lowest marks she must score for fourth test are.
 (a) 40 (b) 50 (c) 60 (d) 70
- Question 7) By solving the inequality $\frac{1}{2} 4 (x+2) > \frac{1}{3} (x+2)$, the answer will be.
 (a) $x > -\frac{1}{5}$ (b) $x > \frac{-1}{7}$ (c) $x > \frac{-2}{5}$ (d) $x > \frac{-2}{9}$
- Question 8) If $x > y$ and $y > z$, then
 (a) $x > z$ (b) $x > z$ (c) $x = 0$ (d) $y = 0$
- Question 9) By solving the inequality $a - 7 < 5 - 3a$, the answer will be
 (a) $a < 3$ (b) $a < 5$ (c) $a < 7b$ (d) $a < 7$
- Question 10) If $a < b$ and $b < 0$, then
 (a) a is less than equal to 0 (b) a is greater then equal to 0 (c) $a = b$ (d) both a & b
- Question 11) By solving the inequality $\frac{1}{3} (x+4) > (6-2x)$, the answer will be
 (a) $x < \frac{12}{5}$ (b) $x < \frac{11}{5}$ (c) $x < \frac{13}{5}$ (d) $x < \frac{14}{5s}$
- Question 12) If $a < b$ then the sign used between $a/-5$ and $b/-5$ is of.
 (a) less than (b) greater than (c) equal to (d) greater then and equal to
- Question 13) If $a - 5 = b$, then
 (a) a is equal to zero (b) a is equal to b (c) a is greater than b (d) a is less than b
- Question 14) By solving the inequality $18-y > 9$, the answer will be
 (a) $y > 9$ (b) $y < 9$ (c) $y < 5$ (d) $y > 12$

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- Question 15) If $x < 25$ and $25 < b$ then
 (a) $b = 0$ (b) $a = 0$ (c) $a < b$ (d) $a > b$
- Question 16) By solving the inequality $(2x + \frac{3}{4}) - (x + \frac{2}{2}) > 1 - (x + \frac{3}{2})$, then the answer will be
 (a) $x < 15$ (b) $x > 22$ (c) $x < 22$ (d) $x < 18$
- Question 17) By solving the inequality $4x - 16 < 0$ the answer will be
 (a) $x < 11$ (b) $x > 6$ (c) $x > 4$ (d) $x < 4$
- Question 18) By solving the inequality $2 \left(\frac{a}{2} + \frac{3}{4} \right) > \frac{4a}{6}$ the answer will be
 (a) $a > -68$ (b) $a > -48$ (c) $a > -78$ (d) $a > -56$
- Question 19) By solving the inequality at $a + 2 < 5$, the value of a must be
 (a) greater than 5 (b) less than 9 (c) greater than 3 (d) less than 3
- Question 20) By solving the inequality $-8 + 2x < 6 - x$, the answer will be
 (a) $x > 4$ (b) $x < 10$ (c) $x < 8$ (d) $x > 6$
- Question 21) By solving the inequality $\frac{1}{4}(2-x) > \frac{1}{3}(4-x) + \frac{1}{2}$, the answer becomes.
 (a) $x > 18$ (b) $x > 16$ (c) $x > 14$ (d) $x > 11$
- Question 22) If $a < y$ and $y < z$. then
 (a) $x > 3$ (b) $3 > x$ (c) $z > y$ (d) None
- Question 23) By solving the inequality $5a - 4 > 6$, the value of ' a ' is
 (a) greater than 2 (b) less than 2 (c) greater than 5 (d) less than 6
- Question 24) By solving the inequality $2(x+2) < 3(x+1) + 8$ the answer will be
 (a) $x < -9$ (b) $x > -7$ (c) $x > -13$ (d) $x < -6$
- Question 25) If $x > y$ and $y > z$ then
 (a) $x > z$ (b) $x < z$ (c) $x = 0$ (d) $y = 0$

Chapter – 18

- Question 1) The sum of angles of a quadrilateral is
 (a) 90° (b) 80° (c) 360° (d) 270°
- Question 2) A quadrilateral with only one pair of opposite side parallel is called
 (a) Trapezium (b) Square (c) Rectangle (d) Rhombus
- Question 3) The consecutive angle of a parallelogram are
 (a) complementary (b) Supplementary (c) Equal (d) None
- Question 4) If in a parallelogram its diagonals bisect each other at 90° and are equal then it is a
 (a) Square (b) Rectangle (c) Rhombus (d) Rite
- Question 5) If in a parallelogram its diagonals bisect each other at right angles and are equal, then it is a
 (a) Square (b) Rectangle (c) Rhombus (d) Parallelogram
- Question 6) The quadrilateral formed by joining the mid-point of the side of a quadrilateral ABCD taken in order is a square only if.
 (a) ABCD is a rhombus (b) diagonals of ABCD are equal
 (c) Diagonals of ABCD are equal and perpendicular (d) Diagonals of ABCD are perpendicular
- Question 7) Which of the following is not true?
 (a) Every square is rectangle (b) Every rectangle is a quadrilateral
 (c) Every Parallelogram is a trapezium (d) None of these
- Question 8) Which of the following is not true for a parallelogram?
 (a) Diagonals bisect each other (b) Opposite sides are equal
 (c) Opposite angles are equal (d) Opposite angles are bisected by the diagonals
- Question 9) If two consecutive sides of a rhombus are represented by $3x-6$ and $x+14$, then the perimeter of the rhombus is.
 (a) 10 (b) 24 (c) 70 (d) 4
- Question 10) A quadrilateral must be parallelogram if one pair of opposite side is
 (a) congruent only (b) parallel (c) congruent and parallel
 (d) parallel and the other pair of opposite side is congruent
- Question 11) The perimeter of a rhombus is 60. If the length of its longer diagonal measures 24, the length of the shorter diagonal is
 (a) 20 (b) 18 (c) 15 (d) 9
- Question 12) The perimeter of a rhombus whose diagonals measure 12 & 16 is
 (a) 10 (b) 20 (c) 40 (d) 80
- Question 13) Which statement is true about all parallelograms
 (a) The area is the product of two adjacent side (b) The diagonals are congruent
 (c) The opposite sides are congruent (d) The diagonals are perpendicular to each other
- Question 14) In a rectangle ABCD, diagonals intersect at B. If $AB = 40$ and $CD = x+5$, find x .
 (a) 10 (b) 18 (c) 15 (d) 20
- Question 15) The fourth angle of the quadrilateral that has three acute angles is
 (a) acute (b) right (c) obtuse (d) straight
- Question 16) The angles of a quadrilateral are in the ratio 1 : 2 : 3 : 4. The smallest angle is
 (a) 36° (b) 9° (c) 18° (d) 24°
- Question 17) The angles of a quadrilateral are in the ratio 2 : 3 : 6 : 13. The smallest angle is
 (a) 20° (b) 18° (c) 15° (d) 25°
- Question 18) A quadrilateral whose all angles are right is called a
 (a) rectangle (b) rhombus (c) kite (d) trapezium
- Question 19) If one angle of a parallelogram is two thirds of its adjacent angle, what is the smallest angle of parallelogram.
 (a) 36° (b) 28° (c) 72° (d) 120°

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- Question 20) In a parallelogram ABCD, diagonals AC & BD intersect at O and AC = 13.4 cm and BD = 9.2cm. Find the measure of OC
 (a) 6.7cm (b) 4.6cm (c) 7.6cm (d) 6.4cm
- Question 21) All sides of a square are
 (a) equal (b) unequal (c) parallel (d) None
- Question 22) All sides of a rhombus are
 (a) equal (b) unequal (c) parallel (d) None of these
- Question 23) The diagonals of a rhombus bisect the
 (a) interior angles (b) exterior angles (c) None (d) Both a & b
- Question 24) The diagonals of a rhombus bisect each other at.
 (a) right angles (b) straight angles (c) Reflex (d) obtuse
- Question 25) In an isosceles trapezium, the non-parallel sides are
 (a) equal (b) unequal (c) both a & b (d) None

Chapter – 25

- Question 1) By converting the 5.6m^2 into the cm^2 , the answer will be
 (a) 0.0056cm^2 (b) 5600cm^2 (c) 56000cm^2 (d) 560cm^2
- Question 2) A rectangular field is 40m long and 30m wide. The perimeter of rectangular field is
 (a) 200m^2 (b) 180m^2 (c) 160m^2 (d) 140m^2
- Question 3) By converting the 0.96km^2 into m^2 , the answer will be
 (a) 9600m^2 (b) 960m^2 (c) 0.96m^2 (d) 960000m^2
- Question 4) By converting the 4.8mm^2 into the cm^2 , the answer will be.
 (a) 0.048cm^2 (b) 0.48cm^2 (c) 48cm^2 (d) 480cm^2
- Question 5) By converting the 80.2km^2 into the hectare, the answer will be
 (a) 0.8020 ha (b) 8020 ha (c) 802 ha (d) 0.802 ha
- Question 6) The type of quadrilateral which has one pair of parallel sides is called
 (a) triangle (b) semi-circle (c) parallelogram (d) trapezium
- Question 7) If the base of parallelogram is 19cm and the height is 11cm then the area of parallelogram is
 (a) 105cm^2 (b) 209cm^2 (c) 110^2 (d) 170cm^2
- Question 8) If the base of parallelogram is 19cm and the height is 11cm then the area of parallelogram is
 (a) 105cm^2 (b) 209cm^2 (c) 110^2 (d) 170cm^2
- Question 9) If the width of rectangle is 10cm less than its length and its perimeter is 50cm then the width of rectangle is
 (a) 58cm^2 (b) 64cm^2 (c) 15cm^2 (d) 30cm^2
- Question 10) Converting the cm^2 into m^2 , the 6.5cm^2 , is equal to
 (a) 0.00065m^2 (b) 0.0065m^2 (c) 0.65m^2 (d) 65m^2
- Question 11) By converting the 78580m^2 into hectare, the answer will be
 (a) 785.80 ha (b) 0.000785 ha (c) 0.07858 ha (d) 78.580 ha
- Question 12) If length of a square field is 12cm, then the perimeter of square will be
 (a) 48cm^2 (b) 24cm^2 (c) 36cm^2 (d) 50cm^2
- Question 13) If the area of circle is 112m^2 then the circumference of the circle is
 (a) 27.68m^2 (b) 37.68m^2 (c) 50.68m^2 (d) 55.68m^2
- Question 14) By converting the 62.7m^2 into km^2 the answer will be
 (a) 0.0000627km^2 (b) 0.0627km^2 (c) 0.00627km^2 (d) 6270km^2
- Question 15) If the length of rectangle is 15cm and width of rectangle is 5cm then the area of rectangle is
 (a) 35cm^2 (b) 40cm^2 (c) 75cm^2 (d) 70cm^2
- Question 16) By converting the 85600mm^2 , into m^2 the answer will be.
 (a) 8560m^2 (b) 856m^2 (c) 0.0856m^2 (d) 8560000m^2
- Question 17) By converting the 60.8cm^2 into the mm^2 , the answer will be.
 (a) 0.0608mm^2 (b) 0.608mm^2 (c) 6080mm^2 (d) 608mm^2
- Question 18) By converting the 6.5 ha into m^2 the answer will be
 (a) 650m^2 (b) 6500m^2 (c) 0.65m^2 (d) 65000m^2
- Question 19) If the diameter of a truck wheel is 0.65m and truck is travelling at 40km / hr then the number of revolutions per minute made by truck wheel is
 (a) 3223 (b) 5223 (c) 6223 (d) 8500
- Question 20) If the height of trapezium is 8cm and the sum of parallel sides is 16cm then the area of trapezium is
 (a) 85cm^2 (b) 54cm^2 (c) 64cm^2 (d) 32cm^2
- Question 21) The kind of quadrilateral in which opposite pairs of the sides are parallel and equal is called
 (a) parallelogram (b) trapezium (c) triangle (d) semi-circle
- Question 22) The type of quadrilateral whose diagonals are equal is
 (a) rhombus (b) kite (c) rectangle (d) trapezium
- Question 23) The sum of all angles of quadrilateral is
 (a) 360° (b) 540° (c) 1080° (d) 720°
- Question 24) A quadrilateral which has all sides equal can be a.
 (a) rectangle (b) kite (c) trapezium (d) square
- Question 25) A square has its diagonals
 (a) equal (b) unequal (c) parallel (d) None

Chapter – 26

- Question 1) The angle subtended by the diameter of a semi-circle is
 (a) 45° (b) 180° (c) 190° (d) 60°
- Question 2) The formula used to measure the circumference of circle is
 (a) $2\pi r$ (b) $\pi r^2 + 2r$ (c) πr^2 (d) πr^3
- Question 3) In the formula $2\pi r$, 'r' is considered as
 (a) circumference (b) area (c) Perimeter (d) radius

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- Question 4) The formula used to measure area of circle is
 (a) $4\pi r^2$ (b) πr^2 (c) $2\pi r$ (d) $2\pi r (h+r)$
- Question 5) If the circumference of circle is 82π , then the value of r is.
 (a) 41cm (b) 82cm (c) 27.34cm (d) 20cm
- Question 6) A parallelogram circumscribing a circle is
 (a) square (b) rhombus (c) rectangle (d) in circle
- Question 7) The area of sector inscribing angle o of a circle of radius 'r' is
 (a) πr^2 (b) $\frac{1}{2} \pi r^2$ (c) πr^2 (d) $\frac{1}{2} r^2 O$
- Question 8) Two circles having same centres are called
 (a) in centric circles (b) concentric circles (c) centric circles (d) None
- Question 9) The tangents drawn at the ends of a diameter of a circle are
 (a) parallel (b) perpendicular (c) non-parallel (d) None
- Question 10) The length of tangents drawn from an internal point to a circle are
 (a) equal (b) unequal (c) always 3 times the other (d) None of these
- Question 11) Segment joining the points of contact of two parallel tangents.
 (a) will not pass through the centre (b) will pass through the centre
 (c) may or may not pass through centre (d) None of these
- Question 12) The circumference of circle of radius 14cm is
 (a) 44cm (b) 66cm (c) 88cm (d) None
- Question 13) The area of circle of radius 14cm is
 (a) 512cm^2 (b) 616cm^2 (c) 712cm^2 (d) 826cm^2
- Question 14) The circumference of circle of radius 4.2cm is
 (a) 32.5cm (b) 28.32cm (c) 29.94cm (d) 26.40cm
- Question 15) The area of circle with radius 4.2cm is
 (a) 44.55cm^2 (b) 55.44cm^2 (c) 88.44cm^2 (d) 44.88cm^2
- Question 16) The diameter of a circle whose circumference is 308 cm is
 (a) 49cm (b) 24.5cm (c) 98cm (d) None
- Question 17) The diameter of circle whose area is 962.5cm^2 is
 (a) 35cm (b) 30cm (c) 25cm (d) 20cm
- Question 18) Area of circular ring is
 (a) $\pi R^2 - r^2$ (b) $\pi R^2 - Rr^2$ (c) $\pi (R^2 - r^2)$ (d) None
- Question 19) The circumference of a circle of radius 21cm is
 (a) 122cm (b) 112cm (c) 132cm (d) None
- Question 20) The area of circle of radius 1cm is
 (a) 1326cm^2 (b) 1386cm^2 (c) 1364cm^2 (d) None
- Question 21) The radius of circle whose area is 5544cm^2 is
 (a) 22cm (b) 28cm (c) 44cm (d) 42cm
- Question 22) The radius of circle whose circumference is 66cm is
 (a) 11cm (b) 10.5cm (c) 12cm (d) None
- Question 23) If the diameter is 63cm, the perimeter becomes.
 (a) 112cm (b) 115cm (c) 142cm (d) 162cm
- Question 24) Diameter of a wheel is 3cm. The wheel revolves 28 times in a minute. To cover a distance of 5280cm, the wheel will take
 (a) 10 min (b) 20 min (c) 30 min (d) 40 min
- Question 25) If the circumference and area of a circle are numerically equal, then the diameter of the circle is equal to
 (a) 2 (b) π (c) 2π (d) 4

Chapter – 30

- Question 1) Probability of getting the sum as 4 when a pair of dice is rolled
 (a) $\frac{3}{4}$ (b) $\frac{1}{12}$ (c) $\frac{1}{9}$ (d) $\frac{1}{6}$
- Question 2) Probability of getting exactly 2 heads when three coins are tossed together.
 (a) $\frac{1}{8}$ (b) $\frac{1}{4}$ (c) $\frac{3}{8}$ (d) $\frac{5}{8}$
- Question 3) Probability of selecting a consonant from the letter of the word 'FATHER'.
 (a) $\frac{1}{3}$ (b) $\frac{3}{4}$ (c) $\frac{5}{6}$ (d) $\frac{2}{3}$
- Question 4) Probability of getting more than 2 heads when a pair of coins in tossed.
 (a) 1 (b) $\frac{1}{2}$ (c) $\frac{1}{3}$ (d) 0
- Question 5) Probability of getting a red ball from a bag containing 20 red balls.
 (a) 0 (b) 1 (c) $\frac{1}{20}$ (d) $\frac{1}{2}$
- Question 6) Probability of getting a non red ball from a bag containing 4 red, 5 blue and 3 black balls is
 (a) $\frac{1}{3}$ (b) $\frac{2}{3}$ (c) $\frac{1}{4}$ (d) $\frac{5}{12}$
- Question 7) In a throw of coin what is the probability of getting head
 (a) 1 (b) 2 (c) $\frac{1}{2}$ (d) 0
- Question 8) In a throw of coin what is the probability of getting tails
 (a) 1 (b) 2 (c) $\frac{1}{2}$ (d) 0
- Question 9) Two unbiased coins are tossed. What is probability of getting at most one tail.
 (a) $\frac{1}{2}$ (b) $\frac{1}{3}$ (c) $\frac{3}{2}$ (d) $\frac{3}{4}$
- Question 10) 3 unbiased coins are tossed, what is the probability of getting at least 2 tails
 (a) $\frac{1}{3}$ (b) $\frac{1}{6}$ (c) $\frac{1}{2}$ (d) $\frac{1}{8}$

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- Question 11) In a throw of dice what is the probability of getting number greater than 5
 (a) $\frac{1}{2}$ (b) $\frac{1}{3}$ (c) $\frac{1}{5}$ (d) $\frac{1}{6}$
- Question 12) What is the probability of getting a sum 9 from two throws of dice.
 (a) $\frac{1}{3}$ (b) $\frac{1}{9}$ (c) $\frac{1}{12}$ (d) $\frac{2}{9}$
- Question 13) Two dice are thrown simultaneously. What is the probability of getting two numbers whose product is even.
 (a) $\frac{3}{4}$ (b) $\frac{1}{4}$ (c) $\frac{7}{4}$ (d) $\frac{1}{2}$
- Question 14) In a bon there are 8 red 7 blue and 6 green balls. One ball is picked up randomly. What is the probability that is neiger blue nor green
 (a) $\frac{2}{3}$ (b) $\frac{8}{21}$ (c) $\frac{3}{7}$ (d) $\frac{9}{22}$
- Question 15) A card is drawn from a pack of 52 cards the probability of getting a queen of club or a king of heart is
 (a) $\frac{1}{13}$ (b) $\frac{2}{13}$ (c) $\frac{1}{26}$ (d) $\frac{1}{52}$
- Question 16) From a pack of 52 cards. 1 card is drawn at random. Find the probability of a face card drawn.
 (a) $\frac{3}{13}$ (b) $\frac{1}{52}$ (c) $\frac{1}{4}$ (d) None of these
- Question 17) A box contains 20 electric bulbs, out of which 4 are defective. Two bulbs are chosen at random from this box. The probability that at least one of these is defective is
 (a) $\frac{7}{19}$ (b) $\frac{6}{19}$ (c) $\frac{5}{19}$ (d) $\frac{4}{19}$
- Question 18) A speaks truth in 75% of cases and B in 80% of cases. In what percentage of cases are they likely to contradict each other, narrating the same incident.
 (a) 30% (b) 35% (c) 40% (d) 45%
- Question 19) From a pack of 52 cards, two cards are drown together, what is the probability that both the cards are kings
 (a) $\frac{2}{121}$ (b) $\frac{2}{221}$ (c) $\frac{1}{221}$ (d) $\frac{1}{13}$
- Question 20) A box contains 5 green, 4 yellow and 3 white balls. Three balls are dawn at random. What is the probability of not same colour
 (a) $\frac{52}{55}$ (b) $\frac{3}{55}$ (c) $\frac{41}{44}$ (d) $\frac{3}{44}$
- Question 21) 15 bag contain 10 black & 20 white balls, one ball is drawn at random. What is the probability of white
 (a) 1 (b) $\frac{2}{3}$ (c) $\frac{1}{3}$ (d) $\frac{4}{3}$
- Question 22) There is a pack of 52 cards and Rohan draws two cards together, what is the probability that one is spade & one is heart
 (a) $\frac{11}{102}$ (b) $\frac{13}{102}$ (c) $\frac{11}{104}$ (d) $\frac{11}{102}$
- Question 23) Probability of P in letter 'PEN'
 (a) $\frac{1}{2}$ (b) $\frac{3}{8}$ (c) $\frac{1}{3}$ (d) $\frac{5}{6}$
- Question 24) Probability of getting the sum as 5 when a pair of dice is rolled.
 (a) $\frac{5}{4}$ (b) $\frac{1}{2}$ (c) $\frac{3}{4}$ (d) $\frac{2}{6}$
- Question 25) Probability of getting 'F' in 'FAN'
 (a) $\frac{1}{3}$ (b) $\frac{2}{3}$ (c) $\frac{3}{7}$ (d) $\frac{3}{3}$

