Business Mathematics - 11th Class Business Math Full Book Short Questions Preparation

Q1. Name any three types of matrix.

Ans 1: Types of matrices are:

Ans 2: i) Row matrix

Ans 3: ii) Column matrix

Ans 4: iii) Rectangular matrix

Ans 5: iv) Square matrix

Q2. Find Ratio between Rs 145 and Rs 105.

Ans 1: Rs 145 : Rs 105 145 : 105Dividing by "5" 29 : 21

Q3. Convert 247 into base 2

Ans 1: $247 = (11110111)_2$

Q4. Define row matrix and give one example.

Ans 1: Row Matrix: A matrix having single row but having any number of columns is called row matrix.
Example: A = [3 4 5 6]
a row matrix , Row matrix is also called row vector.

Q5. What is square matrix.

Ans 1: Square Mattrix: A matrix having equal number of rows and column is called square matrix.

Q6. What is the condition for two matrices to be conformatablve for multiplication.

Ans 1: Two matrices A and B are confirmed for multiplication. AB, if number of columns of A is equal to number of rows of B. The new matric AB will contain the number of rows as in A and number of columns as in B.

Q7. Explain the annuity certain.

Ans 1: Annuity Certain:A financial instrument that provides a stream of payments for a predetermining number of years.An annuity certain will continue a stream of payment remitted to the annuitant's beneficiary or estate,if the annuitant dies before the payment term ends.

Q8. Define an equation.

Ans 1: Equation:Equation in Mathematics is way of expressing equality of two expressing on the basis of logic and number.Example: x + 2 = 5 x2+ 3x + 2 = 0

Q9. Evalute 945 in base 2.

Ans 1: $945 = (1110110001)_2$

Q10. Define variable quantities.

Ans 1: Variable Quantity:A quantity that can assume any of a set of values:

Ans 2: Variable:A variable is a symbol that can be replaced by any one of a set of different numbers.

Ans 3: Example:y = f (x) = x + 6In above relation x is independent variable whereas y is dependent variable.

Q11. Define null matrix

Ans 1: Null Matrix: If each every element of a matrix is zero than that matrix is called null matrix. Null matrix is also called zero matrix and denoted by "0"

Q12. Write at least two key points of compound interest.

Ans 1: Important Key Points of Compound Interest: i) Principal keeps on charging from period to period.

Ans 2: ii) Amount of interest also keeps on changing from period to period.

Ans 3: iii) Rate of interest remains fixed for all periods.

Q13. Write any two basic arithmetic operations.

Ans 1: The basic arithmetic operation are "addition" and "subtraction".

Q14. Find domain and range for relation. {(1,3),(1,4),(1,-1),(1,-2)

Ans 1: Domain of the relation = {1}
Because domain is first element of every order pair in relation Range of relation = {-1,-2,3,4 } Beacuse range is second element of every order pair in relation.

Q15. Write any two methods of finding solutions of a quadratic equation.

Ans 1: Quadratic equation can be solved by following methods:

Ans 2: i) Methods of factorization.

Ans 3: ii) Methods of completing square

Ans 4: iii) Using quadratic formula

Q16. .Find range of the function.

Ans 1: f (x) = x + 1Domain of this function is all real number because function is defined all real value.

Q17. Define function.

Ans 1: Function : A function is a rule taht assigns to each input value exactly one output value.
Example: When some money is invested at a particular interest rate, the interest I depends on the length of time T for which money is invested.

Q18. Express 35:20:45 lowest form.

Ans 1: 35:20:45 "Dividing" by "5"7 : 4 : 9

Q19. Define dependent variable.

Ans 1: Dependent Variable: The variable that represents output values or range of a function is called dependent variable,because its value depend on the values of the independent variable."The dependent variable is a function of independent variable that is same as output is function of input".

Q20. Find the equation in term of x and y 2 : y:: 3 : x

Ans 1: 2 : y :: 3 : xProduct of extreme = Product of mean 2 * x = 3 * y 2x = 3y 2x - 3y = 0