Business Mathematics - 11th Class Business Math Chapter 4 Short Questions Preparation

Q1. Define independent variable.

Ans 1: Independent Variable:A variable that represent input values or domain of a function is called as independent variable.

Q2. 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.

Q3. Define domain of the function.

Ans 1: Domain:Domain is the "set of input values for which rule is definite"

Ans 2: Example:f(x) = 2x-3 Domain of that function is all real values because function defined all real values.

Q4. Write the domain and range of linear function y = 2x + 3

Ans 1: Domain of this function is all real number because function is defined all real values.

Q5. What is the range of the function?

Ans 1: Range of the Function: Range of the function is the "set of all definite output values" Range depends on the domain of the function.

Q6. 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.

Q7. Define inplicit function with one example.

Ans 1: A function or relation in whihc the dependent variableis not isolated on one side of the equation.
Example: $x^2 + xy - y^2 = 1$ represent an implicit relationship.

Q8. Find domain of f (x) = x/5

Ans 1: Domain of the function is all real values because function is defined all real values.

Q9. 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".

Q10. .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.
