

Exercises

(A) Tick (✓) the correct answer.

- 1) All functions start with
  - a) = sign ☒
  - b) + sign
  - c) – sign
  - d) / sign
- 2) Which of these is a correct cell range?
  - a) AVG(A1;A5)
  - b) AVG(A1:A5)
  - c) AVG(A1-A5)
  - d) None of these ☒
- 3) Which functions returns text in upper case?
  - a) =upper (text) ☒
  - b) Upper text
  - c) =upper “text”
  - d) None of these
- 4) Which function can be used to perform operations such as addition, multiplication, division and square root?
  - a) Statistical functions
  - b) Logical functions
  - c) Mathematical functions ☒
  - d) None of these
- 5) It is used to find the average of the arguments
  - a) Max (num1,num2)
  - b) Min (num1,num2)
  - c) Avg (num1,num2)
  - d) None of these ☒
- 6) The function returns the square root of a given number
  - a) sqroot
  - b) sqrt ☒
  - c) sqt
  - d) sqr
- 7) It is useful when you want to manipulate the result which you have obtained by applying some formula
  - a) Filter option
  - b) Sort option
  - c) Goal seek option ☒
  - d) Data Manipulation
- 8) This is used to make comparisons in your spreadsheet
  - a) Data Manipulation
  - b) Logical functions ☒
  - c) Text functions
  - d) None of these
- 9) Which function is used to display the records which have some specific criteria?
  - a) Filter option ☒
  - b) Sort option
  - c) Goal seek option
  - d) Data Manipulation
- 10) Which function returns the number of characters including spaces
  - a) Lower (text)
  - b) Len (text) ☒
  - c) Mod
  - d) Sum

(B) Write (T) for true and (F) for false.

- 1) In the function =SUM(A1:A12), the argument is SUM. False
- 2) The sqrt(Num1) function returns the Square of the number Num1. False
- 3) The =max(num1,num2,...) function returns the maximum value out of the arguments. True
- 4) The =average(12,14,16) will give the result 16. False
- 5) The Logical functions return the result as True or False. True
- 6) If you want to apply formatting to cells which contain data that meets certain conditions, you can use conditional formatting. True

(C) Fill in the blanks.

- 1) Functions are the special pre-written formulae and instructions that ‘accept’ the values as arguments and ‘return’ the result values.
- 2) The len function returns the number of characters including spaces.
- 3) The left function returns n characters starting from the left side.
- 4) The mod function returns the remainder after dividing num1 by num2.
- 5) The Goal Seek option is useful when you want to manipulate the result which you have obtained by applying some formula.
- 6) You can use the Filter option to display only those records which meet some specific criteria.

(D) Answer in one word/sentence.

Q.1) Which special functions in Excel help you get quick results and handle large volumes of data easily?

Ans= Inbuilt functions in Excel help us get quick results and handle large volumes of data easily.

Q.2) Write the syntax of a function.

Ans= General syntax of a function is

=Function name (Arguments)

For example, =AVERAGE(B1:B8) or =SUM(9,8,12)

Q.3) What do you use to open and close a function?

Ans= Parentheses are used to open and close a function, like Sum().

Q.4) What is the syntax for joining multiple text strings into one? Write an example.

Ans= For joining multiple text strings into one, we use

Syntax: =concatenate(text1,text2)

Example: =concatenate("My", "Country") = MyCountry

Q.5) Write one example of the syntax for returning text in lowercase.

Ans= To return text in lowercase, we use

Syntax: =lower(text)

Example: =lower("CRICKET") = cricket

Q.6) Write the syntax for returning the sum value of the arguments.

Ans= To return the sum value of the arguments, we use

Syntax: =Sum(num1,num2)

Example: =Sum(7,8) = 15

Q.7) Which option will you use to display only those records which meet some specific criteria.

Ans= We will use the Filter option to display only those records which meet some specific criteria.

(E) Give short answers.

Q.1) What are functions?

Ans= Functions are special pre written formulae and instructions that 'accept' the values as arguments and 'return' the values in the cell in which they have been typed. General syntax of a function is

=Function name (Arguments)

For example, =AVERAGE(B1:B8) or =SUM(9,8,12)

Q.2) Name the five categories of functions. Explain any three functions from any three categories.

Ans= Functions can be broadly classified under five categories:

i) Text functions

ii) Mathematical functions

iii) Statistical functions

iv) Date and time functions

v) Logical functions

a. Text functions: These help you to manage the text data in your spreadsheets.

| Syntax       | Purpose                                             | Example                        |
|--------------|-----------------------------------------------------|--------------------------------|
| =len(text)   | Returns the number of characters, including spaces. | =len("Cricket") = 7            |
| =lower(text) | Returns text in lowercase.                          | =lower("CRICKET")<br>= cricket |
| =upper(text) | Returns text in uppercase.                          | =upper("cricket")<br>= CRICKET |

- b. Mathematical functions: These can be used to perform common mathematical operations such as addition, multiplication, etc.

| Syntax              | Purpose                                               | Example                     |
|---------------------|-------------------------------------------------------|-----------------------------|
| =Sum(num1,num2)     | Returns the sum value of arguments.                   | =sum(7,8)<br>= 15           |
| =Product(num1,num2) | Returns the product of the values given as arguments. | =Product(9,10,12)<br>= 1080 |
| =Sqrt(num), num>0   | Returns the Square root of the number.                | =sqrt(4)<br>= 2             |

- c. Statistical functions: These can be used to analyse the data in a spreadsheet.

| Syntax                  | Purpose                                         | Example                    |
|-------------------------|-------------------------------------------------|----------------------------|
| =average(num1,num2,...) | Returns the average of the arguments.           | =average(10,12,14)<br>= 12 |
| =max(num1,num2,...)     | Returns the maximum value out of the arguments. | =max(10,12,9,7)<br>= 12    |
| =min(num1,num2,...)     | Returns the minimum value out of the arguments. | =min(10,12,9,7)<br>= 7     |

Q.3) What is the Goal Seek option and how is it useful?

Ans= The Goal Seek option is useful when you want to manipulate the result which you have obtained by applying some formula.

Q.4) What is the use of the Filter option?

Ans= The Filter command is used to display only those records which meet some specific criteria.

Q.5) What is the use of conditional formatting?

Ans= If we want to apply formatting to cells which contain data that meets certain conditions, we can use conditional formatting.