

BASIC DATA TYPES

PRESENTED BY,
ASST. PROF. SHRUTI DESHMUKH

Basic Data Types

- Vb language also supports number of data types
- Data types in Vb are classified as :
 - Numeric
 - String
 - Date
 - Boolean
 - Variant

Numeric Data Type

- It is used to store the numbers .They are divided as:
 - Byte: Used to store integer values in range of 0-255
 - Integer:Used to store integer values in the range of (-32,768)-(+32,767)
 - Long : Used to store integer values in range(-2,147,483,468)-(+2,147,483,468)
 - Single: Store floating point values in range of (-3.4x10³⁸)-(+3.4x10³⁸)
 - Double : store floating point values
 - Currency :Used to store monetary values.It supports 4 digits to right of decimal and 15 digits to left

String Data type

- It is used to store alphanumeric values
- Length of a character can store approximately 4 billion characters

Date Data Type

- It is used to store date as well as time values
- A variable which is declared as date can store the values date as well as time
- The range of date is :
01/01/0100 to 12/31/9999

Boolean Data Type

- It is used to hold either true or false value
- They are internally stored as :
 - 1 for true
 - 0 for false

Variant Data type

- It stores any type of data
- It is default data type
- In vb , if we declare a variable without any data type then it s considered as variant

Variables

- They are the memory locations used to store the value temporary
- Before using the variables it is necessary to declare it
- There are various ways of declaring variables in vb .

Ways to declare variables

- Explicit Declaration
- Implicit Declaration

Explicit Declaration

- It is declared using Dim statement followed by variable name and type as follows:

Dim varname As Type

Ex :Dim college_name As String

Dim index As integer

Rules for naming the variables

- It must begin with alphabet
- It should not be more than 255 characters
- It must be unique
- It should contain any special characters like, @, &, % or \$

Implicit Declaration

- You can also declare variables without specifying their types
- VB creates a variable 'Variant' for it

Ex: `Dim var1,var2`

A variant type can store any type of values

It is a flexible type of data type

- Finally, you can omit the declaration statements
- For this we have to add a suffix as shown below:

Symbol	Datatype
\$	String
%	Integer
&	Long
!	Single
#	Double

Constants in VB

- Some of the variables do not change the value during the execution
- This are the constants
- Constants are named storage locations in memory ,whose value doesn't change during execution
- Constant can be created as well declared

- Const statement is used to create a constant
- It can be declared in local or global form
- It can be public or private
- General Form :

Public Const

Constantname[AsType]=value

