



SNS COLLEGE OF TECHNOLOGY



Coimbatore-35.

An Autonomous Institution

**Accredited by NBA – AICTE and Accredited by NAAC – UGC with ‘A++’ Grade
Approved by AICTE, New Delhi & Affiliated to Anna University, Chennai**

DEPARTMENT OF COMPUTER SCIENCE ENGINEERING
COURSE CODE & NAME : 23CST205 - Object Oriented Programming Using Java

II YEAR/ III SEMESTER

UNIT – II INTRODUCTION TO JAVA

Topic: BASICS OF JAVA PROGRAMMING-DATATYPES

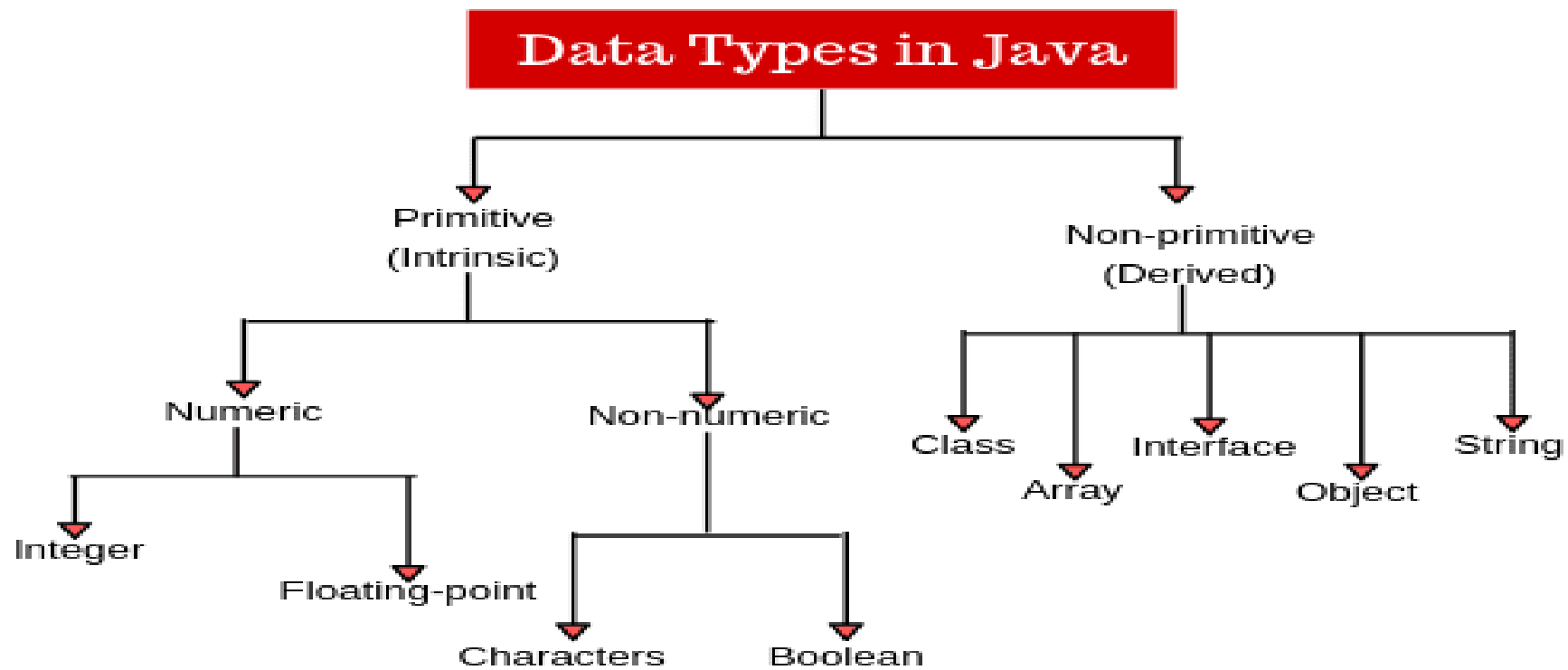
BASICS OF JAVA PROGRAMMING-DATATYPES/23CST205 - Object
Oriented Programming Using Java/B.Sumathi/AP/MCA/SNSCT



DATATYPE

What are Data Types?

- Data types refer to the different sizes and values that can be stored in the variable.
- Two types of data type are in Java programming
 - (A) Primitive data types:** The primitive data types consist of int, float, boolean, byte, short, long, char and double
 - (B) Non-primitive data types:** The non-primitive data types include arrays, interfaces and class etc.





Integer Data Types

byte, short, int, long

Memory size:

- **byte: 8 bits**
- **short: 16 bits**
- **int: 32 bits**
- **long: 64 bits**

Examples:

```
int num = 10;
```



Floating-Point Data Types

- float, double
- Memory size:
 - - float: 32 bits
 - - double: 64 bits
- Examples:
 - float price = 19.99f;
 - double pi = 3.14159;



Character and Boolean Data Type

Character

Keyword : char

Memory size:

- - char: 16 bits (Unicode)

Examples:

- char letter = 'A';

Boolean

Keyword : boolean

Memory size:

- - 1 bit (typically)

Examples:

- boolean isJavaFun = true;



String and Array Data Type

String Class

- Description:
 - Strings are sequences of characters.
- Examples:

String message = "Hello, World!";

Array Types

- Description:
 - Arrays store multiple values of the same type.
- Examples:

int[] numbers = {1, 2, 3, 4};

