

# **Packages**

- A package in java is used to group a related classes, interfaces and subclasses.
- In simple word it is a folder/directory which consists of several classes and interface.

## **Why package??**

- It is increases maintainability.
- It is used to categorize classes and interfaces.
- It increases the access protection.
- It is used to achieve code reusability.

## **Types of package**

1. Built in packages.
2. User defined packages

## **Subpackage:**

- Package inside a package is called as sub package.

## **How to use built in Packages**

- We can use inbuilt package by using two ways
  1. By using fully qualified name.
  2. By using import keyword.
- By using fully qualified name, compiler can understand to which package the specified class is available.

## **Disadvantage of using fully qualified name:**

- We need to use fully qualified name for every time when we are accessing the class or interface.
- Readability is low
- To overcome this we can use a class by using import statement.

## **By using import statement**

- Import statement is used to import the classes or interface present in packages/subpackages.

### **Syntax to use import statement:**

`import package.subpackage.class/interface;`

- By using import statement, instead of using fully qualified name for the classes we can directly use the class name.

Rules to use import statement:

- Import statement should be used before declaring a class
- Import statement should be end with ;
- We can use multiple import statements in the same program.

## **User defined packages**

- In java we can create our own package.

### **Syntax to create a package:**

```
package package_name;
```

### **Syntax to create package along with subpackage:**

```
package package_name.subpackage_name;
```