DemoScopeofVariables.java

```java

//Learn and understand scope of variables,Demonstrate it with an suitable example.//
package week2;
class Hospital
{
    //Instance variable
    String patientName;
    int patientid;
    //Static(class) variable
     static String DocName="Dr.Murthy";
     void sethospital(String pN ,int pId)
    {
        patientName=pN; patientid=pId;
    }
    String getpatientName()
    {
        return patientName;
    }
    int getpatientid()
    {
        return patientid;
    }
}

```

```java
//Learn and understand what are command line arguments? Write a program to implement the same.
package week2;
public class commandLine
{
    public static void main(String[] args)
    {
        if (args.length>0)
            {
                System.out.println("Java Buzzwords....");
                for(byte i=0;i<args.length;i++)
                {
                    System.out.println((i+1)+". "+ args[i]);
                }
            }
        else
            {
                System.out.println("NO COMMANDLINE ARGUMENT FOUND ");
            }
        }
    }
```

Problems | Javadoc | Declaration | Console

<terminated> commandLine [Java Application] C:\Users\admin\Desktop\birthday\diploma\software\eclipse-java-2023-12-R-win32-x86_64\eclipse\plugins\org.eclipse.j

```
Java Buzzwords....
1. robust
2. secure
3. object
4. oriented
5. platform
6. independent
```

```java
    public void giveBonus() {
        if (gender.equalsIgnoreCase("female")) {
            double bonus = salary * 0.1;
            salary += bonus;
            System.out.println(name + "'s salary after bonus: " + salary);
        } else {
            System.out.println(name + " is not eligible for bonus.");
        }
    }
}

public class BonusForFemaleEmployees {
    public static void main(String[] args) {
        List<Employee> employees = new ArrayList<>();
        employees.add(new Employee("Alice", "Female", 50000));
        employees.add(new Employee("Bob", "Male", 60000));
        employees.add(new Employee("Eve", "Female", 55000));

        System.out.println("Issuing 10% bonus for female employees:");
        for (Employee emp : employees) {
            emp.giveBonus();
        }
    }
```

Problems | Javadoc | Declaration | Console

<terminated> BonusForFemaleEmployees [Java Application] C:\Users\admin\Desktop\birthday\diploma\software\eclipse-java-2023-12-R-win32-x86_64\eclipse\plugin

```
Issuing 10% bonus for female employees:
Alice's salary after bonus: 55000.0
Bob is not eligible for bonus.
Eve's salary after bonus: 60500.0
```

BonusForFemaleEmployees.java | employee.java

```java
import java.util.ArrayList;

class Employee {
    String name;
    String gender;
    double salary;

    public Employee(String name, String gender, double salary) {
        this.name = name;
        this.gender = gender;
        this.salary = salary;
    }

    public void giveBonus() {
        if (gender.equalsIgnoreCase("female")) {
            double bonus = salary * 0.1;
            salary += bonus;
            System.out.println(name + "'s salary after bonus: " + salary);
        } else {
            System.out.println(name + " is not eligible for bonus.");
        }
    }
}
```

```java
//Learn and Understand how to Instantiating and Demonstrate it with by creating Student Class.
package week2;
class Student
{
    String StudName,dept;
    int Rollno;
    static String clg = "GPT";
    int percentage;
    void setStudent(String Name, int rollno, String cdept,int per)
    {
        StudName=Name;
        Rollno = rollno;
        dept=cdept;
        percentage=per;
    }
    void getStudent()
    {
        System.out.println(StudName+"\t" +Rollno+"\t"+clg+"\t"+dept+"\t\t"+percentage);
    }
}

```