

Class test 1/2/3

Date: 27-Oct

```
1  class OuterClass {
2      protected int x1 = 10;
3      static int x2 = 200;
4
5      class InnerClass1 {
6          protected int x3 = 5;
7      }
8
9      class InnerClass2 extends InnerClass1
10     {
11         protected int x4 = 2;
12     }
13
14     interface InnerA
15     {
16         int x5 = 100;
17         int x6 = x2;
18         void show();
19     }
20
21 }
22
```

```
22
23 class XClass extends OuterClass
24 {
25     void disp1()
26     {
27         System.out.println("X1 is: " +x1);
28     }
29
30 }
31
32
33 class InterfaceClass implements OuterClass.InnerA
34 {
35     public void show()
36     {
37         System.out.println("X5 via interface is: " +x5);
38         System.out.println("X2 via interface is: " +x6);
39     }
40 }
41
```

```
41
42 public class nested4 {
43     public static void main(String[] args) {
44         OuterClass myOuter = new OuterClass();
45         OuterClass.InnerClass1 myInner1 = myOuter.new InnerClass1();
46         OuterClass.InnerClass2 myInner2 = myOuter.new InnerClass2();
47
48         System.out.println("X1 is: " +myOuter.x1);
49         System.out.println("X2 is: " +myOuter.x2);
50         System.out.println("X2 is: " +myInner1.x3);
51         System.out.println("X3 is: " +myInner2.x4);
52         System.out.println("Checking inner inheritance, X3 is: " +myInner2.x2);
53
54         XClass xc1= new XClass();
55         xc1.disp1();
56
57         InterfaceClass ic = new InterfaceClass();
58         ic.show();
59
60     }
61 }
```

Task

- Run the program given in the previous slides
- Print all the variables.
- Understand (for viva) how variables are accessed depending on their location:
 - Outer class
 - Inner class
 - Inheritance in Inner class
 - Inheritance in outer class

- Submit: code and lab report
- Lab report shall be modified to “Class test”
 - Put the class test no. in serial order (1 for first test, 2 for second test etc.)

THANK YOU!