

COMP 2522 - Winter 2024 - Quizz 1

Note : I put one page per question but the answer can be very short for some of them.

1. Give the answer to the lines indicated with comments (lines 19, 20 and 21). (3 marks)

```
1  class Movie{
2      public void play(){
3          System.out.println("playing movie");
4      }
5  }
6
7  class DVD extends Movie{
8      public void play(){
9          System.out.println("playing DVD");
10     }
11     public void menu(){
12         System.out.println("showing menu");
13     }
14 }
15
16 public class Main{
17     public static void main(String[] args){
18         Movie m = new DVD();
19         m.play(); // 1 : give the output or indicate an error and explain why
20         DVD d = m; // 2 : Error ? If yes, fix if possible
21         m = new DVD();
22         m.menu(); // 3 : give the output or indicate an error and explain why
23     }
24 }
```

Answer :

2. Give the output for the code below. Draw a picture if you want. (2 marks)

```
1 public class X{
2     static void replace(String o){
3         o = "Mystery";
4     }
5
6     static void swap(String[] a, int i, int j){
7         String temp = a[i];
8         a[i] = a[j];
9         a[j] = temp;
10    }
11
12    public static void main(String[] args){
13        String[] words = {"hello","goodbye","crazy"};
14        replace(words[0]);
15        System.out.println(words[0]);
16        swap(words,0,2);
17        System.out.println(words[0]);
18    }
19 }
```

Answer :

3. Which function is in error in the code? Explain WHY (don't say it's a rule, explain WHY it makes sense that function is in error). (2 marks)

```
1  class Y{
2      private static int x;
3      private int y;
4
5      public void setX(int a){
6          x = a;
7      }
8
9      public void setY(int a){
10         y = a;
11     }
12
13     public static void changeX(int a){
14         x = a;
15     }
16
17     public static void change(int a){
18         y = a;
19     }
20 }
```

Answer :