

Java - Week 4

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Assignment 1

```
/Library/Java/JavaVirtualMachines/  
/Users/Williamhui/Code/self-learn
```

Example 1

1

3

5

7

9

=====

Example 2

33

31

29

27

25

Process finished with exit code 0

```
public class Assignment1 {  
    public static void main(String[] args) {  
        // Ex1  
        // 1 3 5 7 9  
        int[] x = new int[5];  
        System.out.println("Example 1");  
  
        for (int i = 0; i < x.length; i++) {  
            x[i] = 2*i + 1;  
        }  
  
        for (int i : x) {  
            System.out.println(i);  
        }  
  
        System.out.println("=====");  
        System.out.println("Example 2");  
  
        // Ex2  
        // 33 31 29 27 25  
        int[] y = new int[5];  
  
        for (int i = 0; i < y.length; i++) {  
            int initial = 33;  
            y[i] = initial - 2*i;  
        }  
  
        for (int i : y) {  
            System.out.println(i);  
        }  
    }  
}
```

Assignment 2

```
/Library/Java/JavaVirtualMachines/jdk-1
/Users/Williamhui/Code/self-learn cour
Original array: [1, 33, 5, 77, 9, 12]
Swapped array: [33, 1, 77, 5, 12, 9]

Process finished with exit code 0
```

```
public class Assignment2 {
    public static void main(String[] args) {
        int temp;
        int[] arr = {1, 33, 5, 77, 9, 12};
        System.out.println("Original array: " + Arrays.toString(arr));

        for (int i = 0; i < arr.length - 1; i+=2) {
            temp = arr[i];
            arr[i] = arr[i + 1];
            arr[i + 1] = temp;
        }

        System.out.println("Swapped array: " + Arrays.toString(arr));
    }
}
```

Assignment 3

Min number is 1

Max number is 70

Second Largest number is 9

[1, 3, 2, 70, 9]

Process finished with exit code 0

```
public class Assignment3_LoopForDesignatedNumber {  
    public static void main(String[] args) {  
        int[] arr = {1, 3, 2, 70, 9};  
        int min = 10000;  
        int max = -9999;  
        int secondLargest = -9999;  
  
        // loop for minimum number  
        for (int i = 0; i < arr.length - 1; i++) {  
            if (arr[i] < min) {  
                min = arr[i];  
            } else if (arr[i] > max) {  
                max = arr[i];  
            }  
  
            // Loop for second largest number  
            for (int j = i + 1; j < arr.length; j++) {  
                if (arr[j] > arr[i]) {  
                    secondLargest = arr[j];  
                }  
            }  
        }  
  
        System.out.println("Min number is " + min);  
        System.out.println("Max number is " + max);  
        System.out.println("Second Largest number is " + secondLargest);  
        System.out.println(Arrays.toString(arr));  
    }  
}
```