

# JAVA 8

What is the difference  
between **STREAM** and  
**COLLECTIONS** ?



## Collections :

Collections are more about storing the data and then performing computations. Once the records are added in the collection, it can be iterated multiple times using iterators.

```
public class Collections {  
    public static void main(String[] args) {  
        ArrayList<Integer> aList = new ArrayList<>();  
        aList.add(3);  
        aList.add(5);  
        aList.add(6);  
        aList.add(7);  
  
        //iterating 1st time  
        Iterator<Integer> iterator = aList.iterator();  
        while(iterator.hasNext()){  
            System.out.print(iterator.next());  
        }  
  
        //iterating 2nd time  
        Iterator<Integer> iterator2 = aList.iterator();  
        while(iterator2.hasNext()){  
            System.out.print(iterator2.next());  
        }  
    }  
}
```

## Stream :

Streams are about the **computations only**. You cannot iterate streams multiple times. You will be greeted with below error , if you try to iterate already iterated stream :

**Error :** *java.lang.IllegalStateException: stream has already been operated upon or closed*

```
import java.util.stream.Stream;

public class ArrayToStream {

    public static void main(String[] args) {

        Stream<Integer> values = Stream.of(3,4,5,6,7);

        //iterating once
        values.forEach(System.out::print);

        //iterating twice -- Error
        values.forEach(System.out::print);

    }
}
```