```
-----TestHashMap.java-----
 1
2
   package com.ameya.maps;
3
   import java.util.HashMap;
4
   import java.util.Map;
5
6
7
   public class TestHashMap {
8
9
      public static void main(String[] args) {
         Map<Integer, String> map=new HashMap<Integer, String>();
10
11
         for(int i=0;i<10;i++) {
            map.putIfAbsent(i,"val"+i);
12
         }
13
         map.forEach((id, val)->System.out.println(val));
14
         map.computeIfPresent(3, (num, val)->val+num);
15
         System.out.println("-----");
16
         System.out.println(map.get(3));
17
         System.out.println("-----"):
18
         map.forEach((id, val)->System.out.println(val));
19
         System.out.println("-----");
20
         System.out.println(map.getOrDefault(4, "NOT FOUND"));
21
         System.out.println("-----"):
22
         System.out.println(map.getOrDefault(11, "NOT FOUND"));
23
         System.out.println("-----"):
24
         map.merge(9, "val9",
25
         (value, newValue) -> value.concat("|"+newValue));
         System.out.println(map.get(9));
26
         System.out.println("----");
27
         map.computeIfPresent(9,(num,val)->null);
28
         System.out.println(map.containsKey(9));
29
         System.out.println("-----");
30
         map.forEach((id,val)->System.out.println(val));
31
32
      }
33
34
   -----TestConcurrentHashMap.java------
35
36
   package com.ameya.maps;
37
   import java.util.Map;
38
   import java.util.concurrent.ConcurrentHashMap;
39
40
```

```
public class TestConcurrentHashMap {
41
42
       public static void main(String[] args) {
43
          //Create ConcurrentHashMap object of Type < Integer, String >
44
          ConcurrentHashMap<Integer, String> chm=new
45
          ConcurrentHashMap<Integer, String>();
          //add key-value pairs to map
46
          chm.put(1, "Ameya");
47
          chm.put(2, "Avani");
48
          chm.put(3,"Kshiti");
49
          //add key-values using ConcurrentMap methods
50
          chm.putIfAbsent(4, "Amol");
51
          chm.putIfAbsent(5, "Mukesh");
52
          //not-inserted as key is already present
53
          chm.putIfAbsent(1,"Rajesh");
54
          //iterate using enhanced for loop
55
          for(Map.Entry<Integer,String> m : chm.entrySet()) {
56
              System.out.println("KEY: "+m.getKey()+ " VALUE:
57
              "+m.getValue());
58
          }
59
       }
60
61
62 }
63
64
```