

```
import java.util.*;
import java.util.Map.Entry;

class Subscriber
{
    int id;
    String name;

    Subscriber(int id, String Subscriber)
    {
        this.id=id;
        this.name = name;
    }
    public int get_id()
    {
        return id;
    }
    public String get_value()
    {
        return name;
    }
    public String toString()
    {
        return id+" "+name;
    }
    public int hashCode()
```

```

    {
        return id;
    }
    public boolean equals(Object obj)
    {
        if (this ==obj) {
            return true;
        }
        if (obj==null || getClass()!=obj.getClass())
            return false;
        Subscriber that =(Subscriber )obj;
        return id==that.id && Objects.equals(name ,
that.name);
    }

}

```

```

public class MapDemo {

    public static void main(String[] args) {
        Subscriber s1 = new Subscriber (101, "abc");
        Subscriber s2 = new Subscriber (102, "xyz");
        Subscriber s3 = new Subscriber (103, "pqr");
        Subscriber s4 = new Subscriber (104, "stu");

        Map<String, Subscriber> m =new HashMap<>();
        m.put("1020a", s1);
    }
}

```

```
m.put("1020b", s1);
m.put("1020c", s1);
m.put("1020d", s1);
m.put("2020a", s2);
m.put("2020b", s2);
m.put("2020c", s2);
m.put("3020a", s3);
m.put("3020b", s3);
m.put("4020b", s4);

System.out.println(m);
System.out.println();

Map<Subscriber , List<String>> sub = new
HashMap<>();

for (Map.Entry<String,Subscriber>entry :
m.entrySet())
{
    String deviceid = entry.getKey();
    Subscriber s = entry.getValue();
    if(sub.containsKey(s))
    {
        sub.get(s).add(deviceid);
    }
    else
    {
        List<String>deviceList = new
ArrayList<>();
```

```
        deviceList.add(deviceid);  
        sub.put(s,deviceList );  
    }  
}  
  
System.out.println(sub);  
  
}  
  
}
```