In [1]:
```
def findComplement(num, base):
    binNum = bin(num)[2:]
    length = len(binNum)
    ans = 0
    for i in range(length-1,-1,-1):
        ans += (1 ^ int(binNum[i])) * 2**(length-i-1)
    if base == "10":
        return ans
    elif base == "8":
        return oct(ans)[2:]
    elif base == "16":
        return hex(ans)[2:]
```

In [5]:
```
for i in range(0,255, 23):
    print(findComplement(i, "10"))
    print(findComplement(i, "8"))
    print(findComplement(i, "16"))
    print("----------------------")
```

```
1
1
1
----------------------
8
10
8
----------------------
17
21
11
----------------------
58
72
3a
----------------------
35
43
23
----------------------
12
14
c
----------------------
117
165
75
----------------------
94
136
5e
----------------------
71
107
47
----------------------
48
60
30
----------------------
25
31
19
----------------------
2
2
2
----------------------
```

In [ ]: