

## 1. [Distribute in a circle](#)

```
int Solution::solve(int A, int B, int C) {  
    return (C + A - 1) % B;  
}
```

## 2. [Number of 1 bits](#) && 3. [Count set bits](#)

**Method1 :**

```
int setBits(int N) {  
    // Write Your Code her  
    int count = 0;  
    while (N > 0) {  
        count += (N%2);  
        N /= 2;  
    }  
    return count;  
}
```

**Method 2 :**

```
int setBits(int N) {  
    int count = 0;  
    while (N > 0) {  
        count += (N & 1);  
        N >>= 1;  
    }  
    return count;  
}
```

**Method 3 : using inbuilt function of cpp**

```
int setBits(int N) {  
    return __builtin_popcount(N);  
}
```

#### 4 .[Bit Difference](#)

If we will take the xor of both numbers all bits that are different will become set, then, we can count all set bits in the xor value.

For ex :

A : 5 = 101 and B : 4 = 100 to convert 5 to 4 we need to change the last bit only

Using xor  $5 \oplus 4 = 101 \oplus 100 = (001)$  = in this we can see last bit is only set because it was the only one that is different

XOR table : 5 : 1 0 1

4 : 1 0 0

Ans: 0 0 1

```
int countBitsFlip(int a, int b){  
    int ans = a^b;  
    return (__builtin_popcount (x));  
  
}
```

5 .Find 5 inbuilt function in c++ like min or max etc and write a code around them.

<https://www.geeksforgeeks.org/top-10-most-used-inbuilt-c-functions-for-competitive-programming/>

Practice and Learn from here :

[Learn C++ from here and revise it on weekend](#)