**PROGRAM-4**

**WAP to implement Zig-Zag cipher in C++.**

#include <iostream>

#include <string.h>

#include <stdio.h>

#include<conio.h>

using namespace std;

int main()

{

char s[50],A[30],B[30];

int a=0,b=0;

cout <<"\nEnter plaintext: ";

gets(s);

int len=strlen(s),j=0;

for(int i=0;i<len;i++)

{

if(isspace(s[i]))

{

j=i;

for(;j<len-1;j++)

s[j] = s[j+1];

if(i!=j)

{

s[j] = '\0';

len--;

}

}

}int n;

cout<<"\nEnter Key ";

cin>>n;

int x=strlen(s);

for(int i=0;i<x;i++)

{

if(i%n==0)

A[a++]=s[i];

else

B[b++]=s[i];

}

A[a]='\0';

B[b]='\0';

strcat(A,B);

cout<<"\nEncrypted text:\t";

puts(A);

getch();

return 0;

}

**OUTPUT**

Enter plaintext: india beats pakistan

Enter Key 3

Encrypted text: iiesktndabatpaisan