Program 1:
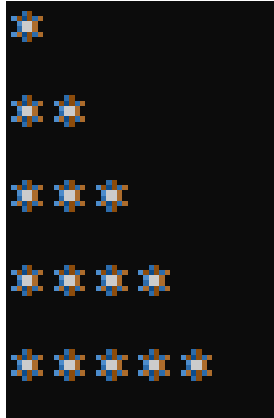# Write a Program to check a number is prime or not?

SOL:

```cpp
#include "stdafx.h"
#include<iostream>
using namespace std;
int main()
{
        int a;
        cout<<"Enter a number"<<endl;
        cin>>a;
        bool prime=true;
        for(int i=2; i<=a/2; i++){
                int r= i % 2;
                if(r == 0){
                        prime=false;
                        break;
                }
        }
        if(prime == true){
                cout<<"The given value is prime number"<<endl;
        }
        else{
                cout<<"The given value is composite number"<<endl;
        }
        system("pause");
        return 0;
}
```

Program 2:
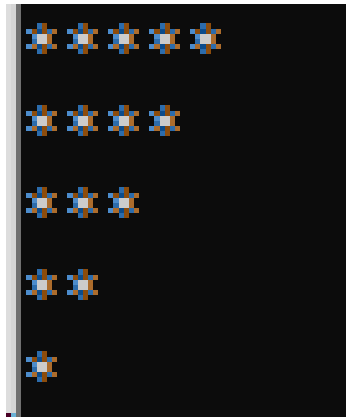## Write a Program to show the following output?

Sol:
```
#include "stdafx.h"
#include<iostream>
using namespace std;

int _tmain(int argc, _TCHAR* argv[])
{

        for(int i=1; i<=5; i++){
                for(int j=1; j<=i; j++){
                        cout<<"*";
                }
                cout<<endl;
        }
        system("pause");
        return 0;
}
```

Program 3:
Write a Program to show the following output?

Sol:
```
#include "stdafx.h"
#include<iostream>
using namespace std;

int _tmain(int argc, _TCHAR* argv[])
{

        for(int i=5; i>=1; i--){
                for(int j=1; j<=i;j++){
                        cout<<"*";
                }
                cout<<endl;
        }
                cout<<endl;
        }
        system("pause");
        return 0;
}
```

Program 3:
Write a Program to show the following output?

Sol:
```cpp
#include "stdafx.h"
#include<iostream>
using namespace std;

int _tmain(int argc, _TCHAR* argv[])
{

        for(int i=1; i<=5; i++){
                for(int k=5-i; k>0; k--){
                        cout<<" ";
                }
                for(int j=1; j<=i; j++){
                        cout<<"*";
                }
                cout<<endl;
        }

        system("pause");
        return 0;
}
```

Program 3:
Write a Program to show the following output?

Sol:
```cpp
#include "stdafx.h"
#include<iostream>
using namespace std;

int _tmain(int argc, _TCHAR* argv[])
{

        for(int i=5; i>=1; i--){
                for(int k=5-i; k>0; k--){
                        cout<<" ";
                }
                for(int j=1; j<=i; j++){
                        cout<<"*";
                }
                cout<<endl;
        }
        system("pause");
        return 0;
}
```

Program 4:

Print C in *.

Sol:

```cpp
#include "stdafx.h"
#include<iostream>
using namespace std;

int _tmain(int argc, _TCHAR* argv[])
{
	for(int i=1; i<=5; i++){
		for(int j=1; j<=15; j++){
			cout<<"*";
		}
		cout<<endl;
	}
	for(int i=1; i<=5; i++){
		for(int j=1; j<=8; j++){
			cout<<"*";
		}
		cout<<endl;
	}
	for(int i=1; i<=5; i++){
		for(int j=1; j<=15; j++){
			cout<<"*";
		}
		cout<<endl;
	}
	system("pause");
	return 0;
}
```

Program 4:

Print I in *.

```
#include "stdafx.h"
#include<iostream>
using namespace std;

int _tmain(int argc, _TCHAR* argv[])
{
        for(int i=1; i<=5; i++){
                for(int j=1; j<=15; j++){
                        cout<<"*";
                }
                cout<<endl;
        }
        for(int i=1; i<=5; i++){
                for(int j=1; j<=5; j++){
                        cout<<" ";
                }
                for(int j=6; j<=10; j++){
                        cout<<"*";
                }
                for(int j=11; j<=15;j++){
                        cout<<" ";
                }
                cout<<endl;
        }
        for(int i=1; i<=5; i++){
                for(int j=1; j<=15; j++){
                        cout<<"*";
                }
                cout<<endl;
        }

        system("pause");
        return 0;
}
```