

C programs To C# Programs

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Program:1

Write a c# program for Multiplication of a Number

Code:

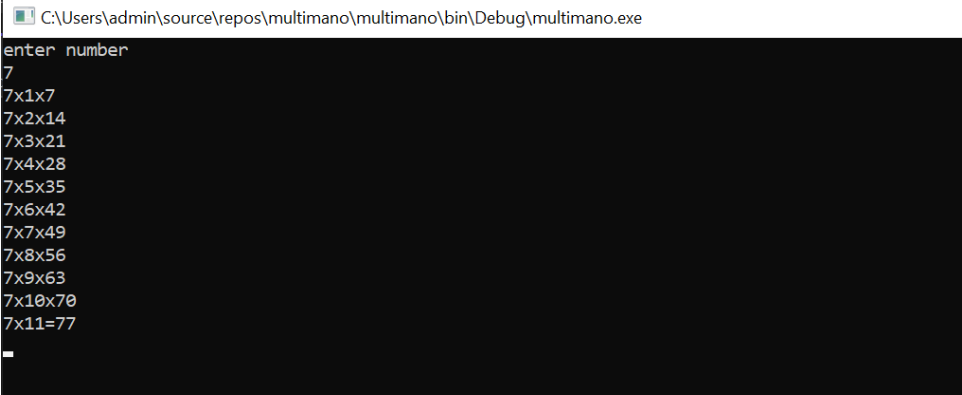
```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace Console_Multiplication_Table
{
    internal class Program
    {
        static void Main(string[] args)
        {
            //variable declaration
            int input, i;
            Console.WriteLine("enter number");
            input = Convert.ToInt32(Console.ReadLine());

            //logic
            for (i = 1; i <= 10; i++)
            {
                Console.WriteLine(input + "x" + i + "x" + input * i);

            }
            for (i = 1; i <= 10; i++) ;
            {
                Console.WriteLine("{0}x{1}={2}", input, i, input * i);
            }
            Console.ReadLine();
        }
    }
}
```

Output:



Program 2:

Write a c program to print factorial of a given number

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;


namespace fact
{
    internal class Program
    {
        static void Main(string[] args)
        {

            //variable declaration
            int input, product = 1, i;
            //user input
            Console.WriteLine("Enter any number");
            input = Convert.ToInt32(Console.ReadLine());

            //logic
            for (i = 1; i <= input; i++)
            {
                product = product * i;
            }

            //output
            Console.WriteLine(product);
            Console.ReadLine();
        }
    }
}
```

Output:

 C:\Users\admin\source\repos\fact\fact\bin\Debug\fact.exe

Enter any number

9

362880

Program 3:

Write a c program to print sum N natural numbers

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace Console_SumofNnaturalNumbers
{
    internal class Program
    {
        static void Main(string[] args)
        {
            //variable declaration
            int input, sum = 0, i;

            //user input
            Console.WriteLine("enter any number");
            input = Convert.ToInt32(Console.ReadLine());

            //logic
            for (i = 1; i <= input; i++)
            {
                sum = sum + i;
            }

            //print output
            Console.WriteLine(sum);
            Console.ReadLine();
        }
    }
}
```

Output:

```
C:\Users\admin\source\repos\SumOfNNaturalNums\SumOfNNaturalNums\bin\Debug\SumOfNNaturalNums.exe
enter any number
4
10
```

Program 4:

Write a c program to print factors of a given number

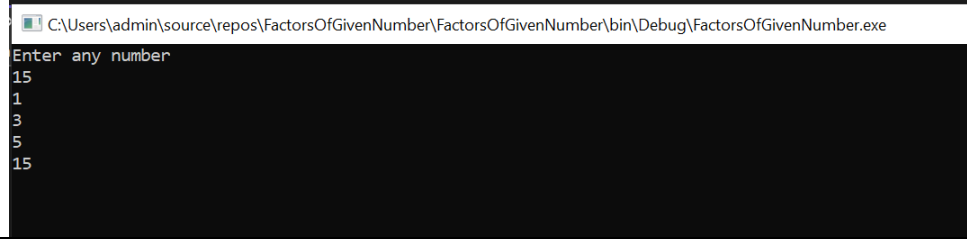
Code

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace FactorsOfGivenNumber
{
    internal class Program
    {
        static void Main(string[] args)
        {
            //variable declarartion
            int input, i;
            Console.WriteLine("Enter any number");
            input = Convert.ToInt32(Console.ReadLine());

            //logic
            for (i = 1; i <= input; i++)
            {
                if (input % i == 0)
                    Console.WriteLine(i);
            }
            Console.ReadLine();
        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\FactorsOfGivenNumber\FactorsOfGivenNumber\bin\Debug\FactorsOfGivenNumber.exe
Enter any number
15
1
3
5
15
```

Program 5 :

Write C# program to print power of a given number

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace PowerOfGivenNums
{
    internal class Program
    {
        static void Main(string[] args)
        {
            int fn, sn;

            int p = 1;

            fn = 60;

            Console.WriteLine("Enter first number:");
            fn = Convert.ToInt32(Console.ReadLine());

            Console.WriteLine("Enter second number:");
            sn = Convert.ToInt32(Console.ReadLine());

            for (int i = 1; i <= sn; i++)

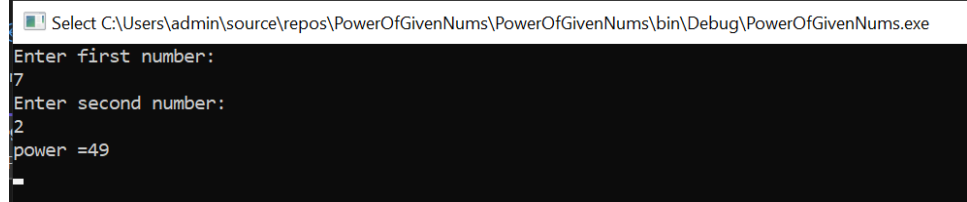
                p = p * fn;

            Console.WriteLine("power is =" + p);

            Console.ReadLine();

        }
    }
}
```

Output:



```
Select C:\Users\admin\source\repos\PowerOfGivenNums\PowerOfGivenNums\bin\Debug\PowerOfGivenNums.exe
Enter first number:
7
Enter second number:
2
power =49
-
```

Program 6:

Write C# program to print factorial using function

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace FactorialUsingFunction
{
    internal class Program
    {
        public static int Factorial(int n)
        {
            int fact = 1;
            for (int i = 1; i <= n; i++)
                fact *= i;
            return fact;
        }
        public static void print(int n)
        {
            Console.WriteLine("Facorial of {0} = {1}", n, Factorial(n));
        }
        static void Main(string[] args)
        {
            int n = 7;

            print(n);
            Console.ReadLine();
        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\FactorialUsingFunction\FactorialUsingFunction\bin\Debug\FactorialUsingFunction.exe
Facorial of 7 = 5040
```

Program 7:

Write C# program on given number is prime or not

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

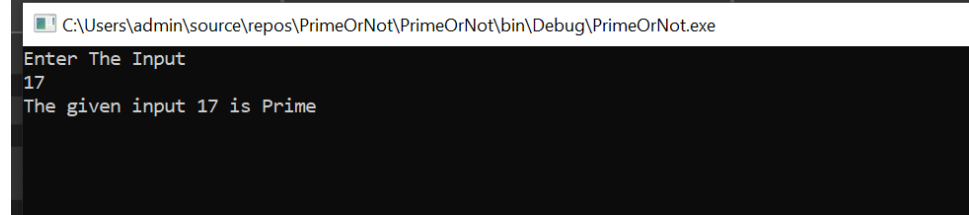
namespace PrimeOrNot
{
    internal class Program
    {
        static void Main(string[] args)
        {
            //variable declaration
            int input, i, count = 0;
            //input
            Console.WriteLine("Enter The Input");
            input = Convert.ToInt32(Console.ReadLine());
            for (i = 2; i <= input; i++)
            {
                if (input % i == 0)
                    break;

            }
            if (i == input)
                Console.WriteLine("The given input {0} is Prime", input);
            else
                Console.WriteLine("The given input {0} is not a prime", input);

            Console.ReadLine();

        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\PrimeOrNot\PrimeOrNot\bin\Debug\PrimeOrNot.exe
Enter The Input
17
The given input 17 is Prime
```

Program 8:

Write C# program for Factorial Using Recursion

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace FactorialUsingRecursion
{
    internal class Program
    {
        public static int Factorial(int n)

        {

            if (n == 0)
                return 1;
            else
                return n * Factorial(n - 1);

        }

        public static void Print(int n)
        {
            Console.WriteLine("Factorial of {0} = {1}", n, Factorial(n));

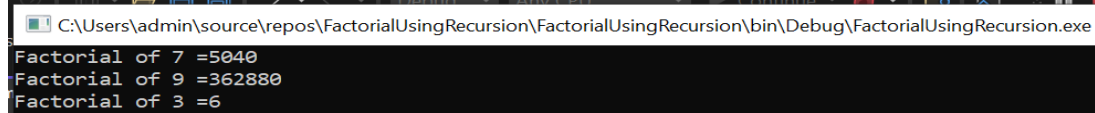
        }

        static void Main(string[] args)
        {

            int n = 7, n1 = 9, n2 = 3;
            Print(n);
            Print(n1);
            Print(n2);
            Console.ReadLine();

        }
    }
}
```

Output:



C:\Users\admin\source\repos\FactorialUsingRecursion\FactorialUsingRecursion\bin\Debug\FactorialUsingRecursion.exe

```
Factorial of 7 =5040
Factorial of 9 =362880
Factorial of 3 =6
```


Program 9:

Write C# program on prime using function

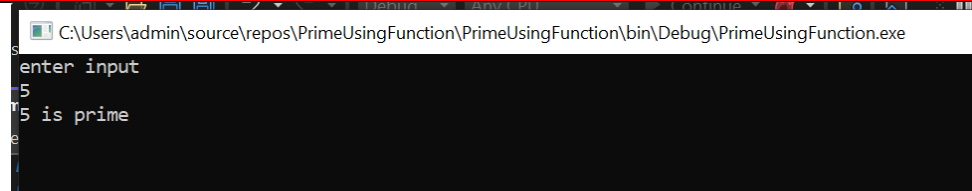
Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace PrimeUsingFunction
{
    internal class Program
    {

        public static void Prime(int input)
        {
            int i;
            for (i = 2; i < input; i++)
            {
                if (input % i == 0)
                    break;
            }
            if (i == input)
                Console.WriteLine("{0} is prime", input);
            else
                Console.WriteLine("{0} is not a prime", input);
        }
        static void Main(string[] args)
        {
            Console.WriteLine("enter input");
            Prime(Convert.ToInt32(Console.ReadLine()));
            Console.ReadLine();
        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\PrimeUsingFunction\PrimeUsingFunction\bin\Debug\PrimeUsingFunction.exe
enter input
5
5 is prime
```

Program 10:

Write C# program of prime in range

Code:

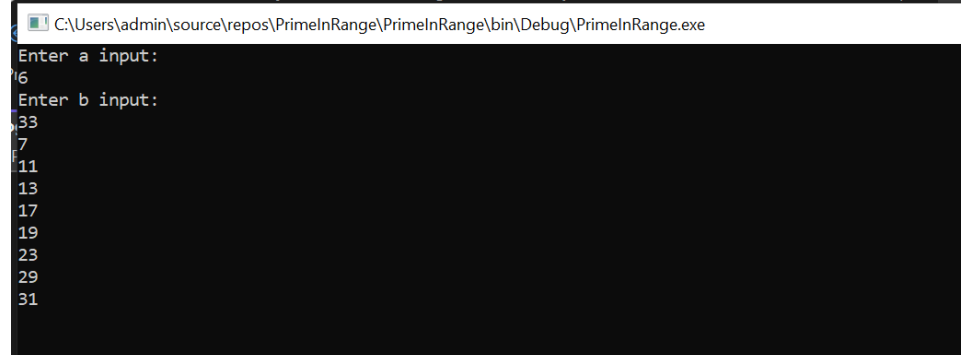
```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace PrimeInRange
{
    internal class Program
    {
        public static bool Prime(int input)
        {
            int i;
            for (i = 2; i < input; i++)
            {
                if (input % i == 0)
                    break;
            }
            if (i == input)
                return true;
            else
                return false;
        }

        static void Main(string[] args)
        {
            int i, a, b;
            Console.WriteLine("Enter a input:");
            a = Convert.ToInt32(Console.ReadLine());
            Console.WriteLine("Enter b input:");
            b = Convert.ToInt32(Console.ReadLine());
            for (i = a; i <= b; i++)
            {
                if (Prime(i))
                    Console.WriteLine(i);
            }

            Console.ReadLine();
        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\PrimeInRange\PrimeInRange\bin\Debug\PrimeInRange.exe
Enter a input:
6
Enter b input:
33
7
11
13
17
19
23
29
31
```

Program 11 :


Write C# program of Fibonacci series

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace Fibonacci
{
    internal class Program
    {
        static void Main(string[] args)
        {
            int input;
            Console.WriteLine("enter input");
            input = Convert.ToInt32(Console.ReadLine());
            int next = 0;
            int prev = 0;
            for (int i = 0; i <= input; i++)
            {
                if (next == 0)
                {
                    next = 1;
                }
                else
                {
                    int temp = next;
                    next = next + prev;
                    prev = temp;
                }
                Console.WriteLine(next);
            }
            Console.ReadLine();
        }
    }
}
```

Output:

 C:\Users\admin\source\repos\Fibonacci\Fibonacci\bin\Debug\Fibonacci.exe

```
enter input
8
1
1
2
3
5
8
13
21
34
```

Program 12:

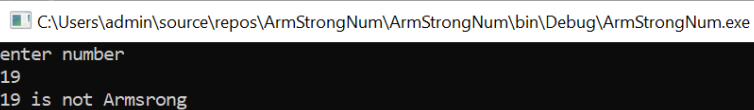
Write C# program of Armstrong

Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace ArmStrongNum
{
    internal class Program
    {
        static void Main(string[] args)
        {
            int number, rem, sum = 0, temp;
            Console.WriteLine("enter number");
            number = Convert.ToInt32(Console.ReadLine());
            temp = number;
            while (number > 0)
            {
                rem = number % 10;
                sum = sum + (rem * rem * rem);
                number = number / 10;
            }
            if (temp == sum)
            {
                Console.WriteLine("{0} is Armstrong", temp);
            }
            else
            {
                Console.WriteLine("{0} is not Armsrong", temp);
            }
            Console.ReadLine();
        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\ArmStrongNum\ArmStrongNum\bin\Debug\ArmStrongNum.exe
enter number
19
19 is not Armsrong
```

Program 13:

Write C# program of Armstrong function

Code:

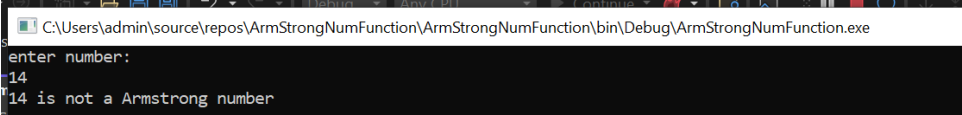
```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace ArmStrongNumFunction
{
    internal class Program
    {

        public static bool Arm(int number)
        {
            int temp, sum = 0, rem;
            temp = number;
            while (number > 0)
            {
                rem = number % 10;
                sum = sum + (rem * rem * rem);
                number = number / 10;
            }
            if (temp == sum)
            {
                return true;
            }
            else
            {
                return false;
            }
        }
        static void Main(string[] args)
        {
            int number;
            Console.WriteLine("enter number:");
            number = Convert.ToInt32(Console.ReadLine());
            if (Arm(number) == true)
                Console.WriteLine("{0} is Armstrong number", number);
            else
                Console.WriteLine("{0} is not a Armstrong number", number);
            Console.ReadLine();

        }
    }
}
```

Output:



Program 14:

Write C# program for Armstrong in Range

Code:

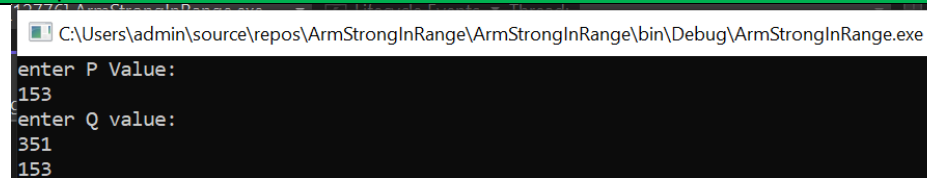
```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace ArmStrongInRange
{
    internal class Program
    {

        public static bool Arm(int number)
        {
            int temp, sum = 0, rem;
            temp = number;
            while (number > 0)
            {
                rem = number % 10;
                sum = sum + (rem * rem * rem);
                number = number / 10;
            }
            if (temp == sum)

            {
                return true;
            }
            else
            {
                return false;
            }
        }
        public static void Main(string[] args)
        {
            int p, q;
            Console.WriteLine("enter P Value:");
            p = Convert.ToInt32(Console.ReadLine());
            Console.WriteLine("enter Q value:");
            q = Convert.ToInt32(Console.ReadLine());
            for (int i = p; i <= q; i++)
            {
                if (Arm(i))
                    Console.WriteLine(i);
            }
            Console.ReadLine();
        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\ArmStrongInRange\ArmStrongInRange\bin\Debug\ArmStrongInRange.exe
enter P Value:
153
enter Q value:
351
153
```

Program 15:

Write C# program for Digit sum

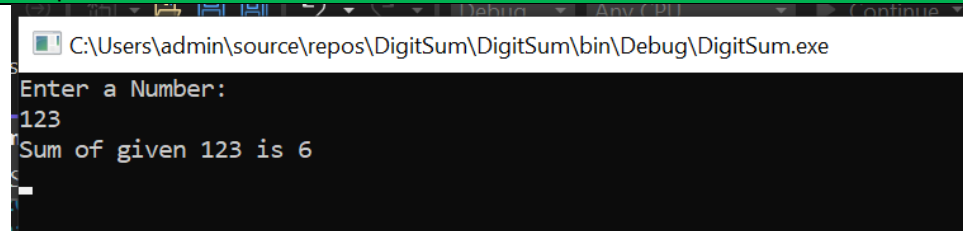
Code:

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace DigitSum
{
    internal class Program
    {
        static void Main(string[] args)
        {
            int rem, sum = 0, number;
            Console.WriteLine("Enter a Number:");
            number = Convert.ToInt32(Console.ReadLine());
            int temp = number;
            while (number > 0)
            {
                rem = number % 10;
                sum = sum + rem;
                number = number / 10;
            }
            Console.WriteLine("Sum of given {0} is {1}", temp, sum);

            Console.ReadLine();
        }
    }
}
```

Output:



```
C:\Users\admin\source\repos\DigitSum\DigitSum\bin\Debug\DigitSum.exe
Enter a Number:
123
Sum of given 123 is 6
```

Program 16:

Write C# program for Reverse a number

Code:

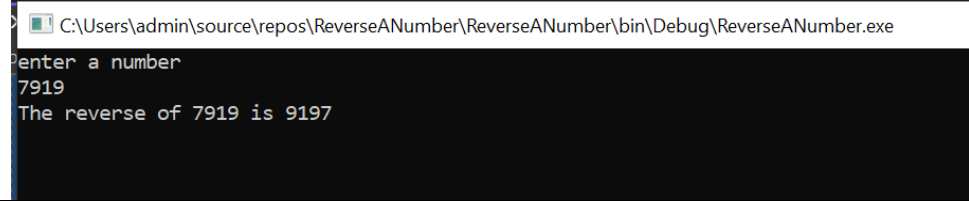
```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Text;
using System.Threading.Tasks;

namespace ReverseANumber
{
    internal class Program
    {
        static void Main(string[] args)
        {
            int n, temp, rem, rev = 0;
            Console.WriteLine("enter a number");
            n = Convert.ToInt32(Console.ReadLine());
            temp = n;
            while (n > 0)
            {
                rem = n % 10;
                rev = (rev * 10) + rem;
                n = n / 10;
            }

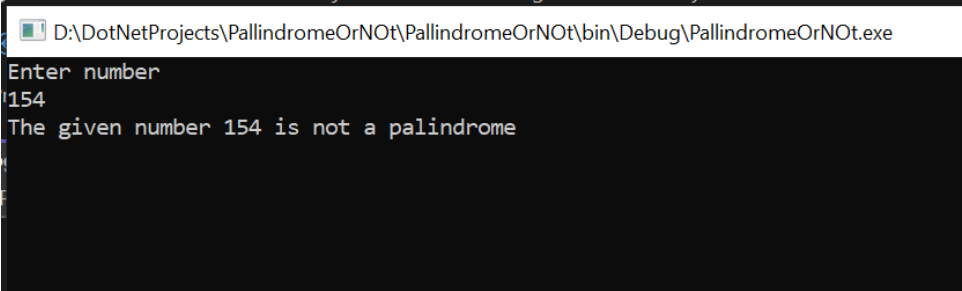
            Console.WriteLine("The reverse of {0} is {1}", temp, rev);

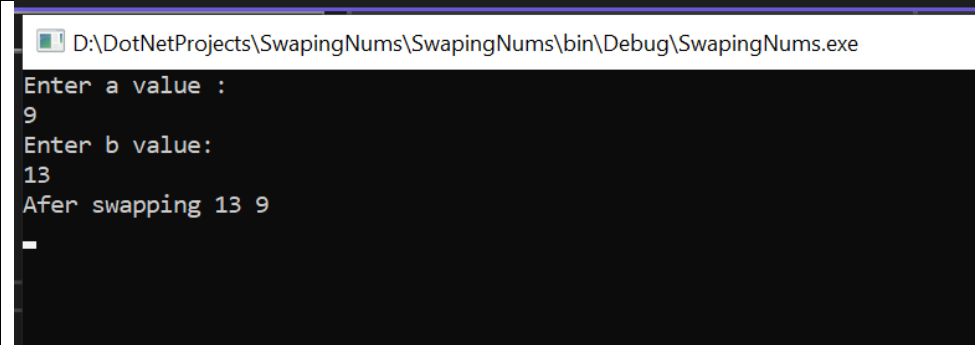
            Console.ReadLine();
        }
    }
}
```

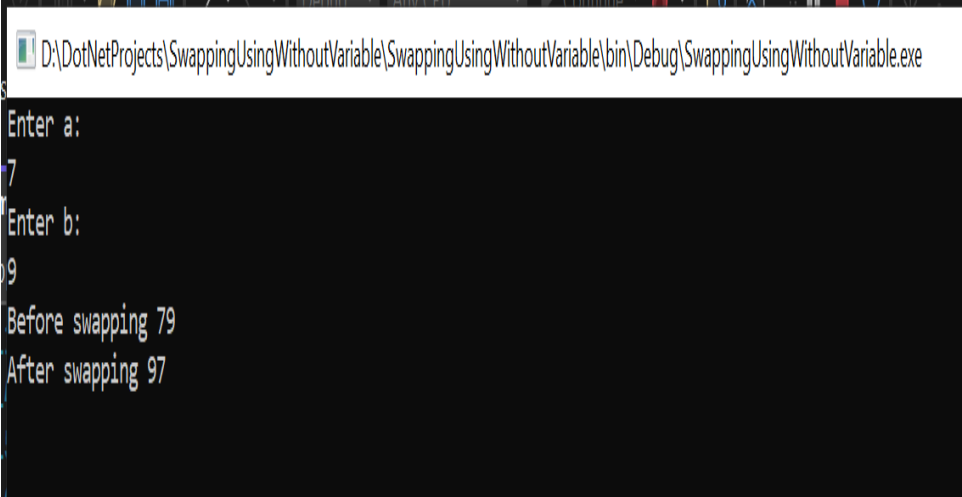
Output:



```
> C:\Users\admin\source\repos\ReverseANumber\ReverseANumber\bin\Debug\ReverseANumber.exe
Enter a number
7919
The reverse of 7919 is 9197
```


Program 17:
Write C# program for given number is palindrome or NOT
Code:
<pre>using System; using System.Collections.Generic; using System.Linq; using System.Text; using System.Threading.Tasks; namespace PallindromeOrNOT { internal class Program { static void Main(string[] args) { int n, temp, rem, rev = 0; Console.WriteLine("Enter number"); n = Convert.ToInt32(Console.ReadLine()); temp = n; while (n > 0) { rem = n % 10; rev = (rev * 10) + rem; n = n / 10; } if (temp == rev) Console.WriteLine("The given number {0} is palindrome", temp); else Console.WriteLine("The given number {0} is not a palindrome", temp); Console.ReadLine(); } } }</pre>
Output:


Program 18:
Write C# program for swapping using variable
Code:
<pre>using System; using System.Collections.Generic; using System.Linq; using System.Text; using System.Threading.Tasks; namespace SwapingNums { internal class Program { static void Main(string[] args) { int temp, a, b; Console.WriteLine("Enter a value :"); a = Convert.ToInt32(Console.ReadLine()); Console.WriteLine("Enter b value:"); b = Convert.ToInt32(Console.ReadLine()); temp = a; a = b; b = temp; Console.WriteLine("Afer swapping {0} {1}", a, b); Console.ReadLine(); } } }</pre>
Output:


Program 19:
Write C# program for swapping without using variable
Code:
<pre>using System; using System.Collections.Generic; using System.Linq; using System.Text; using System.Threading.Tasks; namespace SwappingUsingWithoutVariable { internal class Program { static void Main(string[] args) { int a, b; Console.WriteLine("Enter a:"); a = Convert.ToInt32(Console.ReadLine()); Console.WriteLine("Enter b:"); b = Convert.ToInt32(Console.ReadLine()); Console.WriteLine("Before swapping {0}{1}", a, b); a = a + b; b = a - b; a = a - b; Console.WriteLine("After swapping {0}{1}", a, b); Console.ReadLine(); } } }</pre>
Output:


Program 20:
Write C# program to print stars* in patterns
Code
<pre>using System; using System.Collections.Generic; using System.Linq; using System.Text; using System.Threading.Tasks; namespace PrintStars { internal class Program { static void Main(string[] args) { int n, i, j; Console.WriteLine("Enter no. of rows"); n = Convert.ToInt16(Console.ReadLine()); for (i = 1; i <= n; i++) { Console.WriteLine("*"); } Console.ReadLine(); } } }</pre>
Output:
