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Class: BSCS 6th (M/E)

Lab Exercise: To create and run a console application

1. Start Visual Studio.
2. On the menu bar, choose **File**, **New**, **Project**.

   The **New Project** dialog box opens.
3. Expand **Installed**, expand **Templates**, expand **Visual C#**, and then choose **Console Application**.
4. In the **Name** box, specify a name for your project, and then choose the **OK** button.

   The new project appears in **Solution Explorer**.
5. If Program.cs isn't open in the **Code Editor**, open the shortcut menu for **Program.cs** in **Solution Explorer**, and then choose **View Code**.
6. Replace the contents of Program.cs with the following code.

Example 1:

```
// A Hello World! program in C#.
using System;
namespace HelloWorld
{
   class Hello
   {
      static void Main()
      {
         Console.WriteLine("Hello World!");
         Console.WriteLine("Press any key to exit.");
         Console.ReadKey();
      }
   }
}
```

Example 2: Program to take sum of two integers:

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

namespace asas
{
```

```
   class Program
   {
      static void Main(string[] args)
      {
         int num1 = 40;
         int num2 = 60;
         int sum = num1 + num2;

         Console.Write("The sum is   " + sum);

         Console.ReadKey();
      }
   } }
```

Example 3: Program to take sum of two integers:(Taking input from user):

```
namespace asas
{
   class Program
   {
      static void Main(string[] args)
      {
         int num1;
         int num2;
         Console.WriteLine("Enter First Value    :");
         num1 = int.Parse (Console.ReadLine());

         // Alternate Method of input:
         Console.WriteLine("Enter Second Value    :");
         string dt = (Console.ReadLine());
         num2 = Convert.ToInt16(dt);
         int sum = num1 + num2;

         Console.Write("The sum is   " + sum);

         Console.ReadKey();
      }
   }
}
```

Example 4: If-Else

```
namespace DecisionMaking
{
   class Program
   {
      static void Main(string[] args)
      {
         int a = 100;
         if (a < 20)
         {
```

```
            Console.WriteLine("a is less than 20");
         }
         else
         {
            Console.WriteLine("a is not less than 20");
         }
         Console.WriteLine("value of a is : {0}", a);
         Console.ReadKey();
      }
   }
}
```

Example 4: If-Else-if

```
namespace DecisionMaking
{
    class Program
    {
        static void Main(string[] args)
        {
            int a = 100;
            if (a == 10)
            {
                Console.WriteLine("Value of a is 10");
            }

            else if (a == 20)
            {
                Console.WriteLine("Value of a is 20");
            }

            else if (a == 30)
            {
                Console.WriteLine("Value of a is 30");
            }

            else
            {
                Console.WriteLine("None of the values is matching");
            }
            Console.WriteLine("Exact value of a is: {0}", a);
            Console.ReadKey();
        }
    }
}
```

Example 5: Switch Statement

```
int number = 1;
switch(number)
{
    case 0:
        Console.WriteLine("The number is zero!");
        break;
    case 1:
        Console.WriteLine("The number is one!");
        break;
}
```

Example 6: Switch Statement :we ask the user a question, and suggest that they enter either yes, no or maybe. We then read the user input, and create a switch statement for it.

```
Console.WriteLine("Do you enjoy C# ? (yes/no/maybe)");
string input = Console.ReadLine();
switch(input.ToLower())
{
    case "yes":
    case "maybe":
        Console.WriteLine("Great!");
        break;
    case "no":
        Console.WriteLine("Too bad!");
        break;
}
```

Example 7: While Loop

```
namespace ConsoleApplication1
{
    class Program
    {
        static void Main(string[] args)
        {
            int number = 0;

            while (number < 5)
            {
                Console.WriteLine(number);
                number = number + 1;
            }

            Console.ReadKey();
        }
    }
}
```

Example 8: for Loop

```
namespace ConsoleApplication1
{
    class Program
    {
        static void Main(string[] args)
        {
            int number = 5;

            for (int i = 0; i < number; i++)
                Console.WriteLine(i);

            Console.ReadKey();
        }
    }
}
```