

Asp.net :- Asp.net is a server side Technology used to build dynamic Web Applications.

→ Asp.net code will run using following programming languages.

1. VB.net

2. C#.net

Ajax :- Ajax is a JavaScript based Technology. and Ajax stands for

"Asynchronous JavaScript And XML".

→ Asynchronous requests are more faster and user responsive.

→ Based on Ajax many frameworks are developed like react JS, Angular JS, node JS, etc...

Creating first Website in Asp.net :-

→ open Visual studio 2019 click on file, click on new, click on project. then type Asp.net search option select Asp.net Web Application (.net framework) with C# programming language template.

→ Then click on next. Type the Website Name within Web App parenthesis. Web App Sample. choose the location to save click on create. select the Web forms template, click on create.

Example - to Perform basic arithmetic operations:

In Asp.net:

Enter first number	<input type="text"/> → txtNum1
Enter second number	<input type="text"/> → txtNum2
Result	<input type="text"/> → txtResult
<input type="button" value="Add"/> → button	<input type="button" value="Subtract"/> → button
<input type="button" value="Multiply"/> → button	<input type="button" value="Divide"/> → button

Code:-

```
Public partial class default : System.Web.UI.Page
{
    int Num1, Num2, Result;
}
Protected void btnAdd_Click (Object sender, EventArgs e)
{
    Num1 = Convert.ToInt32(txtNum1.Text);
    Num2 = Convert.ToInt32(txtNum2.Text);
    Result = Num1 + Num2;
    txtResult.Text = Result.ToString();
}
Protected void btnSubtract_Click ( " " )
{
    Num1 = Convert.ToInt32(txtNum1.Text);
    Num2 = Convert.ToInt32(txtNum2.Text);
    Result = Num1 - Num2;
    txtResult.Text = Result.ToString();
}
Protected void btnMultiply_Click ( " " )
{
    Num1 = Convert.ToInt32(txtNum1.Text);
    Num2 = Convert.ToInt32(txtNum2.Text);
    Result = Num1 * Num2;
    txtResult.Text = Result.ToString();
}
```

```

Num1 = Convert.ToInt32(txtNum1.Text);
Num2 = Convert.ToInt32(txtNum2.Text);
Result = Num1 * Num2;
txtResult.Text = Result.ToString();
}
protected void btnDivide_Click ( )
{
    Num1 = Convert.ToInt32(txtNum1.Text);
    Num2 = Convert.ToInt32(txtNum2.Text);
    Result = Num1 / Num2;
    txtResult.Text = Result.ToString();
}

```

difference b/w HTML Controls and Asp.net Standard Controls.

S.N. HTML Controls Asp.net Standard Controls.

- | | |
|---|---|
| 1. All HTML Controls run at client side. | 1. All Asp.net controls run at server side. |
| 2. Can be made to run at server side by adding <code>runat="server"</code> attribute. | 2. Can not be made to run at client side rather Equivalent HTML Code is generated on Rendering. |
| 3. Rendering is not required. | 3. Rendering is required. |
| 4. Execution is fast. | 4. Execution is slow. |
| 5. Do not contain any class for the controls. | 5. Contains a separate class for each control. |

6. Do not supports oops features.

6. supports object oriented features.

7. Do not provide state Management.

7. Provide state management.

Text box Control in Asp.net:-

→ This control is used to accept the required data from the user. To Create Textbox control we use textbox class available in system.Web.UI.WebControls namespace.

Properties With textbox Control:-

1. Id

2. Auto post back
 True
 false

3. Back color

4. Border color

5. Causes Validation
 True
 false

6. Enabled

7. font

8. fore color

9. Height

10. Max length

11. Text

12. Text mode
 single
 multiline
 Password
 color
 Date-time
 E-mail
 numbers

13. Validation Group

14. CSS class

1. **Id** :- Id represents object Name of the control.
2. **Auto post Back** :- When set to true → The page request will be submitted when default event of the control is fired or raised. false → The page request will not be submitted to the server.
3. **BackColor** :- used to set or get Back color.
4. **Border color** :- used to set or get required color to the border of the control.
5. **Causes Validation** :- When set to true → The Validation controls will work.
false → Validation controls will not work.
6. **Enabled** :- When set to true → User can access the control of the runtime.
false →
7. **font** :- used to set or get required font size to the control.
8. **ForeColor** :- used to set or get required color to the data or text of the control.
9. **Height** :- used to set or get required height of the control.
10. **MaxLength** :- used to set or get the value that indicates maximum no. of characters user can be.

allowed to enter into the textbox.

11) Text :- Used to set or get the required data into the control.

12) Text Mode :- When set to single line, user can be allowed to enter the data in one line only.

→ Multiline :- User can be allowed to enter the data in more than one line.

→ Password :- The data entered by user will appear in the form of password format.

→ Colon :- Textbox will behave like a colon picker control.

→ Email :- User can be allowed to enter the data in the form of email id only. So user will not be allowed to enter other than.

→ Date time :- The textbox will accept in the form of date only other than date user will not allow to enter data.

→ Number :- User can be allowed to enter ~~any~~ only number data in textbox.

13) Validation Group :-

Used to set or get a groupName using which we would like to set common validation to the two or more controls.

14) css class:-

used to set or get a css class Name with in () internally. using which we would like to apply to the content.