**4)password\_strength:**

**4)** **Write a code snippet in C# to validate user input in an ASP.NET web**

**form. Include validation for required fields, email format, and**

**password strength.**

<%@ Page Language="C#" AutoEventWireup="true" CodeBehind="WebForm1.aspx.cs" Inherits="WebApplication3.WebForm1" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">

<head runat="server">

<title></title>

</head>

<body>

<form id="form1" runat="server">

<div>

<h2>User Registration</h2>

<asp:Label ID="lblName" runat="server" Text="Name:"></asp:Label>

<asp:TextBox ID="txtName" runat="server"></asp:TextBox>

<asp:RequiredFieldValidator ID="rfvName" runat="server" ControlToValidate="txtName"

ErrorMessage="Name is required." Display="Dynamic" ForeColor="Red"></asp:RequiredFieldValidator>

<br /><br />

<asp:Label ID="lblEmail" runat="server" Text="Email:"></asp:Label>

<asp:TextBox ID="txtEmail" runat="server"></asp:TextBox>

<asp:RequiredFieldValidator ID="rfvEmail" runat="server" ControlToValidate="txtEmail"

ErrorMessage="Email is required." Display="Dynamic" ForeColor="Red"></asp:RequiredFieldValidator>

<asp:RegularExpressionValidator ID="revEmail" runat="server" ControlToValidate="txtEmail"

ErrorMessage="Invalid email format." Display="Dynamic" ForeColor="Red"

ValidationExpression="\b[A-Za-z0-9.\_%+-]+@[A-Za-z0-9.-]+\.[A-Z|a-z]{2,}\b"></asp:RegularExpressionValidator>

<br /><br />

<asp:Label ID="lblPassword" runat="server" Text="Password:"></asp:Label>

<asp:TextBox ID="txtPassword" runat="server" TextMode="Password"></asp:TextBox>

<asp:RequiredFieldValidator ID="rfvPassword" runat="server" ControlToValidate="txtPassword"

ErrorMessage="Password is required." Display="Dynamic" ForeColor="Red"></asp:RequiredFieldValidator>

<asp:RegularExpressionValidator ID="revPassword" runat="server" ControlToValidate="txtPassword"

ErrorMessage="Password must be at least 8 characters long and contain at least one uppercase letter, one lowercase letter, and one number."

Display="Dynamic" ForeColor="Red"

ValidationExpression="^(?=.\*[a-z])(?=.\*[A-Z])(?=.\*\d).{8,}$"></asp:RegularExpressionValidator>

<br /><br />

<asp:Button ID="btnSubmit" runat="server" Text="Submit" OnClick="btnSubmit\_Click" />

</div>

</form>

</body>

</html>

2) **Webform1.aspx->webform1.aspx.cs=**

using System;

using System.Collections.Generic;

using System.Linq;

using System.Web;

using System.Web.UI;

using System.Web.UI.WebControls;

namespace WebApplication3

{

public partial class WebForm1 : System.Web.UI.Page

{

protected void Page\_Load(object sender, EventArgs e)

{

}

protected void btnSubmit\_Click(object sender, EventArgs e)

{

if (Page.IsValid)

{

string name = txtName.Text;

string email = txtEmail.Text;

string password = txtPassword.Text;

}

}

}

}