FINOLEX ACADEMY OF MANAGEMENT AND TECHNOLOGY, RATNAGIRI

DEPARTMENT OF MCA

PRACTICAL NO. 03

Database Programming in ASP.NET

Que.1. Design an ASP.NET web Applications using Connected Database architecture to add, update, delete and search customer information from database table. Consider following schema for customer_info table customer_info(cid primary key, cname, cadd)

Ans:

- **Code –
  WF.ConCustomer.aspx**


```
<%@ Page Language="C#" AutoEventWireup="true" CodeBehind="WF_ConCustomer.aspx.cs"
Inherits="PracticalNo03.WF_ConCustomer" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
   <title>Customer Information </title>
</head>
<body>
   <form id="form1" runat="server">
      <div style="height: 482px">
         <asp:Label ID="Label1" runat="server" Font-Bold="True" Font-Size="Large"
ForeColor="#0033CC" Text="Customer Information ">
         </asp:Label>
```

```
            <br />
            <br />
            <asp:Label ID="Label2" runat="server" Text="Enter Customer ID : "></asp:Label>
            <asp:TextBox ID="txtCid" runat="server" Height="19px"></asp:TextBox>
            <br />
            <br />
            <asp:Label ID="Label3" runat="server" Text="Enter Customer Name : "></asp:Label>
            <asp:TextBox ID="txtCname" runat="server"></asp:TextBox>
            <br />
            <br />
            <asp:Label ID="Label4" runat="server" Text="Enter Customer Address : "></asp:Label>
            <asp:TextBox ID="txtCadd" runat="server"></asp:TextBox>
            <br />
            <asp:GridView ID="gvCustDetails" runat="server">
            </asp:GridView>
            <br />
            <asp:Label ID="lblMessage" runat="server" Text="Message"></asp:Label>
            <br />
            <br />
            <asp:Button ID="btnAdd" runat="server" Height="34px" OnClick="btnAdd_Click"
Text="Add" Width="71px" />
    
            <asp:Button ID="btnUpdate" runat="server" Height="35px" Text="Update" Width="92px"
OnClick="btnUpdate_Click" />
     
            <asp:Button ID="btnSearch" runat="server" Height="34px" Text="Search" Width="89px"
OnClick="btnSearch_Click" />
                 
            <asp:Button ID="btnDelete" runat="server" Height="34px" Text="Delete" Width="82px"
OnClick="btnDelete_Click" />
  
            <br />
        </div>
    </form>
</body>
</html>
```

WF_ConCustomer.aspx.cs

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Web;
using System.Web.UI;
using System.Web.UI.WebControls;
using System.Configuration;
using System.Data;
using System.Data.SqlClient;

namespace PracticalNo03
{
    public partial class WF_ConCustomer : System.Web.UI.Page
    {
```

```csharp
static string conStr = ConfigurationManager.ConnectionStrings["custConString"].ToString();
SqlConnection conn = null;
SqlCommand cmd = null;
SqlDataReader dr = null;
DataTable dt = null;
public void clearTextBox()
{
    txtCid.Text = " ";
    txtCname.Text = " ";
    txtCadd.Text = " ";
}
public void showData()
{
    try
    {
        cmd = new SqlCommand("SELECT * FROM cust", conn);
        if (conn.State == ConnectionState.Closed)
        {
            conn.Open();
        }
        dt = new DataTable();
        dr = cmd.ExecuteReader(); //actual query is fire

        dt.Load(dr);
        gvCustDetails.DataSource = dt;
        gvCustDetails.DataBind();
    }
    catch (Exception ex)
    {
        lblMessage.Text = "Exception " + ex.Message;
    }
    finally //with or without exception finally block is executed
    {
        conn.Close();
    }


}
protected void Page_Load(object sender, EventArgs e)
{
    conn = new SqlConnection(conStr);
    showData();

}

protected void btnAdd_Click(object sender, EventArgs e)
{
    try
    {
        cmd = new SqlCommand("INSERT INTO cust(cid,cname,cadd)
VALUES(@cid,@cnm,@cadd)", conn);
        if (conn.State == ConnectionState.Closed)
        {
            conn.Open();
        }
```

```csharp
                cmd.Parameters.AddWithValue("@cid", txtCid.Text);
                cmd.Parameters.AddWithValue("@cnm", txtCname.Text);
                cmd.Parameters.AddWithValue("@cadd", txtCadd.Text);
                int r = cmd.ExecuteNonQuery();
                if (r != 0)
                {
                    lblMessage.Text = "Record Inserted Successfully!!";
                }
                else
                {
                    lblMessage.Text = "Record Not Inserted!!";
                }
            }
            catch (Exception ex)
            {
                lblMessage.Text = "Exception" + ex.Message;
            }
            finally
            {
                conn.Close();
                clearTextBox();
                showData();
            }
        }

        protected void btnUpdate_Click(object sender, EventArgs e)
        {
            try
            {
                cmd = new SqlCommand("UPDATE cust SET cname=@cnm,cadd=@cad WHERE
cid=@cid", conn);
                if (conn.State == ConnectionState.Closed)
                {
                    conn.Open();
                }
                cmd.Parameters.AddWithValue("@cid", txtCid.Text);
                cmd.Parameters.AddWithValue("@cnm", txtCname.Text);
                cmd.Parameters.AddWithValue("@cad", txtCadd.Text);
                int r = cmd.ExecuteNonQuery();
                if (r != 0)
                {
                    lblMessage.Text = "Record Updated Sucessfully!!";
                }
                else
                {
                    lblMessage.Text = "Record not updated!!";

                }
            }
            catch (Exception ex)
            {
                lblMessage.Text = "Exception" + ex.Message;
            }
            finally
            {
```

```csharp
            conn.Close();
            clearTextBox();
            showData();
        }
    }

    protected void btnSearch_Click(object sender, EventArgs e)
    {
        try
        {
            cmd = new SqlCommand("SELECT * FROM cust WHERE cid=@cid", conn);
            if (conn.State == ConnectionState.Closed)
            {
                conn.Open();
            }
            cmd.Parameters.AddWithValue("@cid", txtCid.Text);
            SqlDataReader dr = cmd.ExecuteReader();
            if (dr.HasRows)
            {
                gvCustDetails.DataSource = dr;
                gvCustDetails.DataBind();

                lblMessage.Text = "Record found!!";
            }
            else
            {
                lblMessage.Text = "Record not found!!";
            }
        }
        catch (Exception ex)
        {
            lblMessage.Text = "Exception" + ex.Message;
        }
        finally
        {
            conn.Close();
        }
    }

    protected void btnDelete_Click(object sender, EventArgs e)
    {

        try
        {
            cmd = new SqlCommand("DELETE cust WHERE cid=@cid", conn);
            if (conn.State == ConnectionState.Closed)
            {
                conn.Open();
            }
            cmd.Parameters.AddWithValue("@cid", txtCid.Text);
            int r = cmd.ExecuteNonQuery();
            if (r != 0)
            {
                lblMessage.Text = "Record deleted Successfully!!";
            }
```

```
                else
                {
                    lblMessage.Text = "Record not deleted!!";
                }
            }
            catch (Exception ex)
            {
                lblMessage.Text = "Exception" + ex.Message;
            }
            finally
            {
                conn.Close();
                clearTextBox();
                showData();
            }
        }
    }
}
```

- **OUTPUT :**

Customer Information

Enter Customer ID :

Enter Customer Name :

Enter Customer Address :

cid	cname	cadd
101	Vaishnavi	Satara
102	Rupesh	Pune
103	Nimish	Sangali
104	Vedant	Ratnagiri
105	Shubham	Mumbai
106	Ritesh	Nimsod

Record Inserted Successfully!!

Add   Update   Search   Delete

Customer Information

Enter Customer ID :

Enter Customer Name :

Enter Customer Address :

cid	cname	cadd
101	Vedantika	Vaduth
102	Rupesh	Pune
103	Nimish	Sangali
104	Vedant	Ratnagiri
105	Shubham	Mumbai
106	Ritesh	Nimsod

Record Updated Sucessfully!!

Add   Update   Search   Delete

Customer Information

Enter Customer ID : 102

Enter Customer Name :

Enter Customer Address :

cid	cname	cadd
102	Rupesh	Pune

Record found!!

Add   Update   Search   Delete

Customer Information

Enter Customer ID :

Enter Customer Name :

Enter Customer Address :

cid	cname	cadd
101	Vedantika	Vaduth
103	Nimish	Sangali
104	Vedant	Ratnagiri
105	Shubham	Mumbai
106	Ritesh	Nimsod

Record deleted Successfully!!

Add   Update   Search   Delete

Que.2. Design an ASP.NET web Applications using Disconnected Database architecture to to add, update,delete and search employee information from database table. Consider following schema for emp_info table emp_info(eid primary key, ename, designation, salary)

Ans:

- **Code –**
  WF_EmpDisconnect.aspx

Employee Information

Enter Employee id :

Enter Employee Name :

Enter Employee Designation :

Enter Employee Salary :

Column0	Column1	Column2
abc	abc	abc
abc	abc	abc
abc	abc	abc
abc	abc	abc
abc	abc	abc

Message

| Add | Delete | Update | Search |

```
<%@ Page Language="C#" AutoEventWireup="true" CodeBehind="WF_EmpDisconnect.aspx.cs"
Inherits="PracticalNo03.WF_EmpDisconnect" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
    <title>Employee Information</title>
</head>
<body>
    <form id="form1" runat="server">
        <div>

            <asp:Label ID="Label1" runat="server" Text="Employee Information" Font-Size="X-Large"
ForeColor="#CC33FF"></asp:Label>

            <br />
            <br />

            <asp:Label ID="Label2" runat="server" Text="Enter Employee id : "></asp:Label>
```

```
        <asp:TextBox ID="txtEid" runat="server" Height="19px"></asp:TextBox>
        <br />

    <asp:Label ID="Label3" runat="server" Text="Enter Employee Name : "></asp:Label>

    <asp:TextBox ID="txtEname" runat="server" style="margin-bottom: 3px"
Height="20px"></asp:TextBox>

        <br />

        <asp:Label ID="Label4" runat="server" Text="Enter Employee Designation : "></asp:Label>
        <asp:TextBox ID="txtDesignation" runat="server"></asp:TextBox>



        <br />
        <asp:Label ID="Label5" runat="server" Text="Enter Employee Salary"></asp:Label>
 :
        <asp:TextBox ID="txtSalary" runat="server" Width="179px"></asp:TextBox>



        <br />
        <br />
        <asp:GridView ID="gvEmpDetails" runat="server">
        </asp:GridView>
        <br />



<asp:Label ID="lblMessage" runat="server" Text="Message"></asp:Label>

        <br />
        <br />

        <asp:Button ID="btnAdd" runat="server" Text="Add" OnClick="btnAdd_Click"  />

           
        <asp:Button ID="btnDelete" runat="server"  Text="Delete" OnClick="btnDelete_Click"  />
 
        <asp:Button ID="btnUpdate" runat="server" Text="Update" OnClick="btnUpdate_Click"  />
 
        <asp:Button ID="btnSearch" runat="server"  Text="Search" OnClick="btnSearch_Click"  />
 

        <br />
        <br />
    </div>
  </form>
</body>
</html>
```

WF_EmpDisconnect.aspx.cs

```
using System;
```

```csharp
using System.Collections.Generic;
using System.Linq;
using System.Web;
using System.Web.UI;
using System.Web.UI.WebControls;
using System.Configuration;
using System.Data;
using System.Data.SqlClient;

namespace PracticalNo03
{
    public partial class WF_EmpDisconnect : System.Web.UI.Page
    {
        static string conStr = ConfigurationManager.ConnectionStrings["empConString"].ToString();
        SqlConnection conn = null;
        SqlCommand cmd = null;
        SqlDataAdapter da = null;
        SqlCommandBuilder builder = null;
        DataSet ds = null;
        public void clearTextBox()
        {
            txtEid.Text = " ";
            txtEname.Text = " ";
            txtDesignation.Text = " ";
            txtSalary.Text = " ";
        }
        public void showData()
        {
            try
            {
                if (conn.State == ConnectionState.Closed)
                {
                    conn.Open();
                }

                da = new SqlDataAdapter();
                ds = new DataSet();

                da.MissingSchemaAction = MissingSchemaAction.AddWithKey;

                cmd = new SqlCommand("SELECT * FROM emp", conn);
                cmd.CommandType = CommandType.Text;
                da.SelectCommand = cmd;

                da.Fill(ds, "empDS");
                gvEmpDetails.DataSource = ds.Tables["empDS"];
                gvEmpDetails.DataBind();
            }
            catch (Exception ex)
            {
                lblMessage.Text = "Exception " + ex.Message;
            }
            finally //with or without exception finally block is executed
            {
                conn.Close();
```

```csharp
            }
        }

        protected void Page_Load(object sender, EventArgs e)
        {
            conn = new SqlConnection(conStr);
            showData();
        }

        protected void btnAdd_Click(object sender, EventArgs e)
        {

            try
            {
                if (txtEid.Text != "" && txtEname.Text != "" && txtDesignation.Text != "" &&
    txtSalary.Text !="")
                {
                    builder = new SqlCommandBuilder(da);

                    DataRow drNew = ds.Tables["empDS"].NewRow();

                    drNew[0] = txtEid.Text;
                    drNew[1] = txtEname.Text;
                    drNew[2] = txtDesignation.Text;
                    drNew[3] = txtSalary.Text;

                    ds.Tables["empDS"].Rows.Add(drNew);

                    builder.GetInsertCommand();

                    int r = da.Update(ds, "empDS");
                    if (r != 0)
                    {
                        lblMessage.Text = "Record Inserted Successfully!!";
                    }
                    else
                    {
                        lblMessage.Text = "Record not Inserted!!";
                    }
                }

            }
            catch (Exception ex)
            {
                lblMessage.Text = "Exception" + ex.Message;
            }
            finally
            {
                conn.Close();
                clearTextBox();
                showData();
            }
        }

        protected void btnDelete_Click(object sender, EventArgs e)
```

```csharp
        {
            try
            {
                if (txtEid.Text != "")
                {
                    builder = new SqlCommandBuilder(da);

                    DataRow drDelete = ds.Tables["empDS"].Rows.Find(Convert.ToInt32(txtEid.Text));

                    drDelete.Delete();


                    builder.GetDeleteCommand();

                    int r = da.Update(ds, "empDS");
                    if (r != 0)
                    {
                        lblMessage.Text = "Record Deleted Successfully!!";
                    }
                    else
                    {
                        lblMessage.Text = "Record not Deleted!!";
                    }
                }
            }

            catch (Exception ex)
            {
                lblMessage.Text = "Exception" + ex.Message;
            }
            finally
            {
                conn.Close();
                clearTextBox();
                showData();
            }
        }

        protected void btnUpdate_Click(object sender, EventArgs e)
        {
            try
            {
                if (txtEid.Text != "")
                {
                    builder = new SqlCommandBuilder(da);

                    DataRow drUpdate = ds.Tables["empDS"].Rows.Find(Convert.ToInt32(txtEid.Text));

                    drUpdate[1] = txtEname.Text;
                    drUpdate[2] = txtDesignation.Text;
                    drUpdate[3] = txtSalary.Text;

                    builder.GetUpdateCommand();

                    int r = da.Update(ds, "empDS");
```

```csharp
                    if (r != 0)
                    {
                        lblMessage.Text = "Record Updated Successfully!!";
                    }
                    else
                    {
                        lblMessage.Text = "Record not Updated!!";
                    }
                }
            }

            catch (Exception ex)
            {
                lblMessage.Text = "Exception" + ex.Message;
            }
            finally
            {
                conn.Close();
                clearTextBox();
                showData();
            }
        }

        protected void btnSearch_Click(object sender, EventArgs e)
        {
            try
            {
                if (txtEid.Text != "")
                {
                    builder = new SqlCommandBuilder(da);

                    DataRow drSearch = ds.Tables["empDS"].Rows.Find(Convert.ToInt32(txtEid.Text));

                    if (drSearch != null)
                    {
                        lblMessage.Text = "Record found Successfully!!";
                        clearTextBox();
                        txtEid.Text = drSearch[0].ToString();
                        txtEname.Text = drSearch[1].ToString();
                        txtDesignation.Text = drSearch[2].ToString();
                        txtSalary.Text = drSearch[3].ToString();
                    }
                    else
                    {
                        lblMessage.Text = "Record not found!!";
                    }
                }
            }

            catch (Exception ex)
            {
                lblMessage.Text = "Exception" + ex.Message;
            }
            finally
            {
```

```
                conn.Close();
                showData();
            }
        }
    }
        }
```
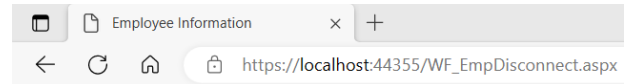
- **OUTPUT :**
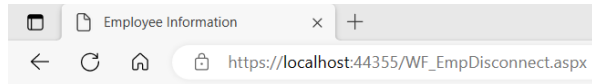
Employee Information

Enter Employee id :
Enter Employee Name :
Enter Employee Designation :
Enter Employee Salary :

eid	ename	designation	salary
101	VaishnaviS	Analyst	60000
102	Rupesh	HR	45000
103	Nimish	Tester	42000
104	Vedant	Manager	55000
105	Shraddha	HR	41000
106	Varad	CEO	1000000

Record Inserted Successfully!!

Add   Delete   Update   Search

Employee Information

Enter Employee id :
Enter Employee Name :
Enter Employee Designation :
Enter Employee Salary :

eid	ename	designation	salary
101	VaishnaviS	Analyst	60000
102	Rupesh	HR	45000
104	Vedant	Manager	55000
105	Shraddha	HR	41000
106	Varad	CEO	1000000

Record Deleted Successfully!!
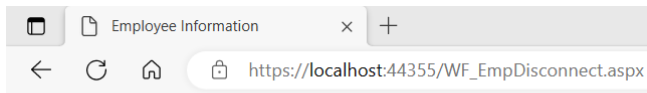
Add   Delete   Update   Search

Employee Information

Enter Employee id :
Enter Employee Name :
Enter Employee Designation :
Enter Employee Salary :

eid	ename	designation	salary
101	VaishnaviS	Analyst	60000
102	Rupesh	HR	45000
104	Nimish	Tester	65000
105	Shraddha	HR	41000
106	Varad	CEO	1000000

Record Updated Successfully!!
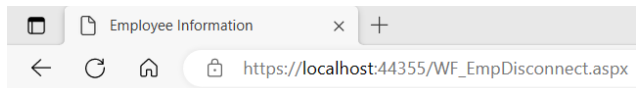
Add   Delete   Update   Search

Employee Information

Enter Employee id : 105
Enter Employee Name : Shraddha
Enter Employee Designation : HR
Enter Employee Salary : 41000

eid	ename	designation	salary
101	VaishnaviS	Analyst	60000
102	Rupesh	HR	45000
104	Nimish	Tester	65000
105	Shraddha	HR	41000
106	Varad	CEO	1000000

Record found Successfully!!

Add   Delete   Update   Search

Que.3. Create stored procedures to add and search employee information from emp_info table and design asp.net web form to call both procedures using connected architecture.

    Ans:

- **Code –**
  WF_ConStoreProcEmp.aspx


```
<%@ Page Language="C#" AutoEventWireup="true"
CodeBehind="WF_ConStoreProcEmp.aspx.cs" Inherits="PracticalNo03.WF_ConStoreProcEmp" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
    <title></title>
</head>
<body>
    <form id="form1" runat="server">
        <div style="height: 469px">
            <asp:Label ID="Label1" runat="server" Text="Employee Information" Font-Size="X-Large"
ForeColor="#CC33FF"></asp:Label>

        <br />
        <br />

    <asp:Label ID="Label2" runat="server" Text="Enter Employee id : "></asp:Label>
        <asp:TextBox ID="txtEid" runat="server" Height="19px"></asp:TextBox>
        <br />

    <asp:Label ID="Label3" runat="server" Text="Enter Employee Name : "></asp:Label>
```

```
      <asp:TextBox ID="txtEname" runat="server" style="margin-bottom: 3px"
Height="20px"></asp:TextBox>

          <br />

          <asp:Label ID="Label4" runat="server" Text="Enter Employee Designation : "></asp:Label>
          <asp:TextBox ID="txtDesignation" runat="server"></asp:TextBox>
          <br />
          <asp:Label ID="Label5" runat="server" Text="Enter Employee Salary"></asp:Label>
 :
          <asp:TextBox ID="txtSalary" runat="server" Width="179px"></asp:TextBox>
           <br />
           <asp:GridView ID="gvEmpDetails" runat="server">
           </asp:GridView>
           <br />
<asp:Label ID="lblMessage" runat="server" Text="Message"></asp:Label>

          <br />
          <br />

          <asp:Button ID="btnAddSP" runat="server" Text="Add Using Stored Procedure"
OnClick="btnAddSP_Click"  />

             
          <asp:Button ID="btnSearchSP" runat="server"  Text="Search Using Stored Procedure"
OnClick="btnSearchSP_Click"   />
 
      </div>
    </form>
</body>
</html>
```

WF_ConStoreProcEmp.aspx.cs

```csharp
using System;
using System.Collections.Generic;
using System.Linq;
using System.Web;
using System.Web.UI;
using System.Web.UI.WebControls;
using System.Configuration;
using System.Data;
using System.Data.SqlClient;

namespace PracticalNo03
{
  public partial class WF_ConStoreProcEmp : System.Web.UI.Page
  {
    static string conStr = ConfigurationManager.ConnectionStrings["empConString"].ToString();
    SqlConnection conn = null;
    SqlCommand cmd = null;
    SqlDataReader dr = null;
    DataTable dt = null;
```

```csharp
public void clearTextBox()
{
    txtEid.Text = " ";
    txtEname.Text = " ";
    txtDesignation.Text = " ";
    txtSalary.Text = " ";
}
public void showData()
{
    try
    {
        cmd = new SqlCommand("SELECT * FROM emp", conn);
        if (conn.State == ConnectionState.Closed)
        {
            conn.Open();
        }
        dt = new DataTable();
        dr = cmd.ExecuteReader();

        dt.Load(dr);
        gvEmpDetails.DataSource = dt;
        gvEmpDetails.DataBind();
    }
    catch (Exception ex)
    {
        lblMessage.Text = "Exception " + ex.Message;
    }
    finally
    {
        conn.Close();
    }


}
protected void Page_Load(object sender, EventArgs e)
{
    conn = new SqlConnection(conStr);
    showData();
}

protected void btnAddSP_Click(object sender, EventArgs e)
{
    try
    {
        cmd = new SqlCommand();
        if (conn.State == ConnectionState.Closed)
        {
            conn.Open();
        }
        cmd.Connection = conn;
        cmd.CommandType = CommandType.StoredProcedure;


        cmd.CommandText = "insertEmpData";
```

```csharp
            cmd.Parameters.Add(new SqlParameter("@eid", SqlDbType.TinyInt)).Value =
Convert.ToInt16(txtEid.Text);
            cmd.Parameters.Add(new SqlParameter("@ename", SqlDbType.NVarChar)).Value =
txtEname.Text;
            cmd.Parameters.Add(new SqlParameter("@designation", SqlDbType.NVarChar)).Value =
txtDesignation.Text;
            cmd.Parameters.Add(new SqlParameter("@salary", SqlDbType.Int)).Value =
Convert.ToInt64(txtSalary.Text);
            int r = cmd.ExecuteNonQuery();

            if (r != 0)
            {
                lblMessage.Text = "Record Inserted Successfully!!";
            }
            else
            {
                lblMessage.Text = "Record not Inserted!!";
            }
        }
        catch (Exception ex)
        {
            lblMessage.Text = "Exception" + ex.Message;
        }
        finally
        {
            conn.Close();
            clearTextBox();
            showData();
        }
    }

    protected void btnSearchSP_Click(object sender, EventArgs e)
    {
        try
        {
            cmd = new SqlCommand();
            if (conn.State == ConnectionState.Closed)
            {
                conn.Open();
            }
            cmd.Connection = conn;
            cmd.CommandType = CommandType.StoredProcedure;
            cmd.CommandText = "searchEmpData";
            cmd.Parameters.Add(new SqlParameter("@eid", SqlDbType.TinyInt)).Value =
Convert.ToInt16(txtEid.Text);
            dr = cmd.ExecuteReader();
            if (dr.HasRows)
            {
                lblMessage.Text = "Record found Successfully!!";
                while (dr.Read())
                {
                    clearTextBox();
                    txtEid.Text = dr["eid"].ToString();
                    txtEname.Text = dr["ename"].ToString();
                    txtDesignation.Text = dr["designation"].ToString();
```

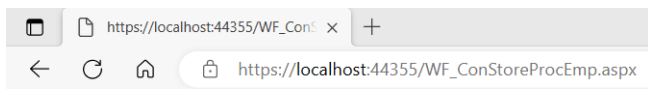```
                    txtSalary.Text = dr["salary"].ToString();
                }
            }
            else
            {
                lblMessage.Text = "Record not found!!";
            }

        }
        catch (Exception ex)
        {
            lblMessage.Text = "Exception" + ex.Message;
        }
        finally
        {
            conn.Close();
            showData();
        }

    }
}
        }
```

- **OUTPUT :**



**Employee Information**

Enter Employee id : [ ]
Enter Employee Name : [ ]
Enter Employee Designation : [ ]
Enter Employee Salary : [ ]

| eid | ename | designation | salary |
|-----|-----------|-------------|---------|
| 101 | VaishnaviS | Analyst | 60000 |
| 102 | Rupesh | HR | 45000 |
| 104 | Nimish | Tester | 65000 |
| 105 | Shraddha | HR | 41000 |
| 106 | Varad | CEO | 1000000 |
| 107 | Ritesh | Tester | 60000 |

Record Inserted Successfully!!

[ Add Using Stored Procedure ]   [ Search Using Stored Procedure ]

**Employee Information**

Enter Employee id : [101]
Enter Employee Name : [VaishnaviS]
Enter Employee Designation : [Analyst]
Enter Employee Salary : [60000]

| eid | ename | designation | salary |
|-----|-----------|-------------|---------|
| 101 | VaishnaviS | Analyst | 60000 |
| 102 | Rupesh | HR | 45000 |
| 104 | Nimish | Tester | 65000 |
| 105 | Shraddha | HR | 41000 |
| 106 | Varad | CEO | 1000000 |
| 107 | Ritesh | Tester | 60000 |

Record found Successfully!!

[ Add Using Stored Procedure ]   [ Search Using Stored Procedure ]

**Que.4. Design asp.net web application to demonstrate DataList, DetailsView, FormView, GridView, ListView and Repeater Data Bound Controls. (Use ProductDetails table).**

 **Ans:**

- **Code –**
  **WF_DataBoundControls.aspx**

## Data Bound Controls

### Data List Control

pid: 0
pname: abc
pdetails: abc
price: 0
quantity: 0

pid: 1
pname: abc
pdetails: abc
price: 1
quantity: 1

pid: 2
pname: abc
pdetails: abc
price: 2
quantity: 2

pid: 3
pname: abc
pdetails: abc
price: 3
quantity: 3

pid: 4
pname: abc
pdetails: abc
price: 4
quantity: 4

**SqlDataSource** - SqlDataSource1

### Details View Control

| pid | 0 |
|-----|---|
| pname | abc |
| pdetails | abc |
| price | 0 |
| quantity | 0 |

**SqlDataSource** - SqlDataSource2

### Form View Control

pid: 0
pname: abc
pdetails: abc
price: 0
quantity: 0

**SqlDataSource** - SqlDataSource3

### Grid View Control

| pid | pname | pdetails | price | quantity |
|-----|-------|----------|-------|----------|
| 0 | abc | abc | 0 | 0 |
| 1 | abc | abc | 1 | 1 |
| 2 | abc | abc | 2 | 2 |
| 3 | abc | abc | 3 | 3 |
| 4 | abc | abc | 4 | 4 |

**SqlDataSource** - SqlDataSource4

### List View Control

| pid: 0 pname: abc pdetails: abc price: 0 quantity: 0 | pid: 1 pname: abc pdetails: abc price: 1 quantity: 1 | pid: 2 pname: abc pdetails: abc price: 2 quantity: 2 | pid: 3 pname: abc pdetails: abc price: 3 quantity: 3 | pid: 4 pname: abc pdetails: abc price: 4 quantity: 4 | pid: 5 pname: abc pdetails: abc price: 5 quantity: 5 | pid: 6 pname: abc pdetails: abc price: 6 quantity: 6 | pid: 7 pname: abc pdetails: abc price: 7 quantity: 7 | pid: 8 pname: abc pdetails: abc price: 8 quantity: 8 | pid: 9 pname: abc pdetails: abc price: 9 quantity: 9 | pid: 10 pname: abc pdetails: abc price: 10 quantity: 10 |
|---|---|---|---|---|---|---|---|---|---|---|

**SqlDataSource** - SqlDataSource5

### Repeater Control

| ProdID | ProdName | ProdDetails | ProdPrice | ProdQuantity |
|--------|----------|-------------|-----------|--------------|
| Databound | Databound | Databound | Databound | Databound |
| Databound | Databound | Databound | Databound | Databound |
| Databound | Databound | Databound | Databound | Databound |
| Databound | Databound | Databound | Databound | Databound |
| Databound | Databound | Databound | Databound | Databound |

**SqlDataSource** - SqlDataSource6

```aspx
<%@ Page Language="C#" AutoEventWireup="true"
CodeBehind="WF_DataBoundControls.aspx.cs"
Inherits="PracticalNo03.WF_DataBoundControls" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
    <title>Data Bound Controls</title>
     <style type="text/css">
        .TableCSS
      {
         border-style:double;
         background-color:white;
         text-align:center;
          margin-bottom: 0px;
       }
       .TableHeader
       {
         background-color:darkgrey;
         color:black;
         font-size:medium;
         font-family:'Gill Sans', 'Gill Sans MT', Calibri, 'Trebuchet MS', sans-serif;
         }
       .TableData
       {
         background-color:gainsboro;
         color:black;
         font-family:Calibri;
         font-size:medium;
         font-weight:bold;
     }
    </style>

</head>
<body>
    <form id="form1" runat="server">
      <div>
         <asp:Label ID="Label1" runat="server" Font-Bold="True" Font-Size="X-Large"
ForeColor="#FF3399" Text="Data Bound Controls"></asp:Label>
         <br />
         <asp:Label ID="Label2" runat="server" Font-Bold="True" Font-Italic="True" Font-
Size="Large" Text="Data List Control"></asp:Label>
         <br />


         <asp:DataList ID="DataList1" runat="server" DataKeyField="pid"
DataSourceID="SqlDataSource1">
             <ItemTemplate>
                pid:
                <asp:Label ID="pidLabel" runat="server" Text='<%# Eval("pid") %>' />
```

```asp
            <br />
            pname:
            <asp:Label ID="pnameLabel" runat="server" Text='<%# Eval("pname") %>' />
            <br />
            pdetails:
            <asp:Label ID="pdetailsLabel" runat="server" Text='<%# Eval("pdetails") %>'
/>
            <br />
            price:
            <asp:Label ID="priceLabel" runat="server" Text='<%# Eval("price") %>' />
            <br />
            quantity:
            <asp:Label ID="quantityLabel" runat="server" Text='<%# Eval("quantity") %>'
/>
            <br />
<br />
        </ItemTemplate>
    </asp:DataList>
    <asp:SqlDataSource ID="SqlDataSource1" runat="server" ConnectionString="<%$
ConnectionStrings:prodConString %>" SelectCommand="SELECT * FROM
[productDetails]"></asp:SqlDataSource>
    <br />
    <asp:Label ID="Label3" runat="server" Font-Bold="True" Font-Italic="True" Font-
Size="Large" Text="Details View Control"></asp:Label>
    <br />
    <br />
    <asp:DetailsView ID="DetailsView1" runat="server" AutoGenerateRows="False"
DataKeyNames="pid" DataSourceID="SqlDataSource2" Height="50px" Width="125px">
        <Fields>
            <asp:BoundField DataField="pid" HeaderText="pid" ReadOnly="True"
SortExpression="pid" />
            <asp:BoundField DataField="pname" HeaderText="pname"
SortExpression="pname" />
            <asp:BoundField DataField="pdetails" HeaderText="pdetails"
SortExpression="pdetails" />
            <asp:BoundField DataField="price" HeaderText="price" SortExpression="price"
/>
            <asp:BoundField DataField="quantity" HeaderText="quantity"
SortExpression="quantity" />
        </Fields>
    </asp:DetailsView>
    <asp:SqlDataSource ID="SqlDataSource2" runat="server" ConnectionString="<%$
ConnectionStrings:prodConString %>" SelectCommand="SELECT * FROM
[productDetails]"></asp:SqlDataSource>
    <br />
    <asp:Label ID="Label4" runat="server" Font-Bold="True" Font-Italic="True" Font-
Size="Large" Text="Form View Control"></asp:Label>
    <br />
    <br />
    <asp:FormView ID="FormView1" runat="server" DataKeyNames="pid"
DataSourceID="SqlDataSource3">
```

```
<EditItemTemplate>
    pid:
    <asp:Label ID="pidLabel1" runat="server" Text='<%# Eval("pid") %>' />
    <br />
    pname:
    <asp:TextBox ID="pnameTextBox" runat="server" Text='<%# Bind("pname")
%>' />
    <br />
    pdetails:
    <asp:TextBox ID="pdetailsTextBox" runat="server" Text='<%# Bind("pdetails")
%>' />
    <br />
    price:
    <asp:TextBox ID="priceTextBox" runat="server" Text='<%# Bind("price") %>'
/>
    <br />
    quantity:
    <asp:TextBox ID="quantityTextBox" runat="server" Text='<%#
Bind("quantity") %>' />
    <br />
    <asp:LinkButton ID="UpdateButton" runat="server" CausesValidation="True"
CommandName="Update" Text="Update" />
     <asp:LinkButton ID="UpdateCancelButton" runat="server"
CausesValidation="False" CommandName="Cancel" Text="Cancel" />
</EditItemTemplate>
<InsertItemTemplate>
    pid:
    <asp:TextBox ID="pidTextBox" runat="server" Text='<%# Bind("pid") %>' />
    <br />
    pname:
    <asp:TextBox ID="pnameTextBox" runat="server" Text='<%# Bind("pname")
%>' />
    <br />
    pdetails:
    <asp:TextBox ID="pdetailsTextBox" runat="server" Text='<%# Bind("pdetails")
%>' />
    <br />
    price:
    <asp:TextBox ID="priceTextBox" runat="server" Text='<%# Bind("price") %>'
/>
    <br />
    quantity:
    <asp:TextBox ID="quantityTextBox" runat="server" Text='<%#
Bind("quantity") %>' />
    <br />
    <asp:LinkButton ID="InsertButton" runat="server" CausesValidation="True"
CommandName="Insert" Text="Insert" />
     <asp:LinkButton ID="InsertCancelButton" runat="server"
CausesValidation="False" CommandName="Cancel" Text="Cancel" />
</InsertItemTemplate>
<ItemTemplate>
```

```aspx
              pid:
              <asp:Label ID="pidLabel" runat="server" Text='<%# Eval("pid") %>' />
              <br />
              pname:
              <asp:Label ID="pnameLabel" runat="server" Text='<%# Bind("pname") %>' />
              <br />
              pdetails:
              <asp:Label ID="pdetailsLabel" runat="server" Text='<%# Bind("pdetails") %>'
/>
              <br />
              price:
              <asp:Label ID="priceLabel" runat="server" Text='<%# Bind("price") %>' />
              <br />
              quantity:
              <asp:Label ID="quantityLabel" runat="server" Text='<%# Bind("quantity") %>'
/>
              <br />

        </ItemTemplate>
      </asp:FormView>
      <asp:SqlDataSource ID="SqlDataSource3" runat="server" ConnectionString="<%$
ConnectionStrings:prodConString %>" SelectCommand="SELECT * FROM
[productDetails]"></asp:SqlDataSource>
      <br />
      <asp:Label ID="Label5" runat="server" Font-Bold="True" Font-Italic="True" Font-
Size="Large" Text="Grid View Control"></asp:Label>
      <br />
      <br />
      <asp:GridView ID="GridView1" runat="server" AutoGenerateColumns="False"
DataKeyNames="pid" DataSourceID="SqlDataSource4">
        <Columns>
          <asp:BoundField DataField="pid" HeaderText="pid" ReadOnly="True"
SortExpression="pid" />
          <asp:BoundField DataField="pname" HeaderText="pname"
SortExpression="pname" />
          <asp:BoundField DataField="pdetails" HeaderText="pdetails"
SortExpression="pdetails" />
          <asp:BoundField DataField="price" HeaderText="price" SortExpression="price"
/>
          <asp:BoundField DataField="quantity" HeaderText="quantity"
SortExpression="quantity" />
        </Columns>
      </asp:GridView>
      <asp:SqlDataSource ID="SqlDataSource4" runat="server" ConnectionString="<%$
ConnectionStrings:prodConString %>" SelectCommand="SELECT * FROM
[productDetails]"></asp:SqlDataSource>
      <br />
      <br />
      <asp:Label ID="Label6" runat="server" Font-Bold="True" Font-Italic="True" Font-
Size="Large" Text="List View Control"></asp:Label>
      <br />
```

```
                    <br />
                    <asp:ListView ID="ListView1" runat="server" DataKeyNames="pid"
DataSourceID="SqlDataSource5">
                        <AlternatingItemTemplate>
                          <td runat="server" style="background-color:#FAFAD2; color: #284775;">pid:
                            <asp:Label ID="pidLabel" runat="server" Text='<%# Eval("pid") %>' />
                            <br />
                            pname:
                            <asp:Label ID="pnameLabel" runat="server" Text='<%# Eval("pname") %>'
/>
                            <br />
                            pdetails:
                            <asp:Label ID="pdetailsLabel" runat="server" Text='<%# Eval("pdetails")
%>' />
                            <br />
                            price:
                            <asp:Label ID="priceLabel" runat="server" Text='<%# Eval("price") %>' />
                            <br />
                            quantity:
                            <asp:Label ID="quantityLabel" runat="server" Text='<%# Eval("quantity")
%>' />
                            <br />
                          </td>
                        </AlternatingItemTemplate>
                        <EditItemTemplate>
                          <td runat="server" style="background-color:#FFCC66; color: #000080;">pid:
                            <asp:Label ID="pidLabel1" runat="server" Text='<%# Eval("pid") %>' />
                            <br />
                            pname:
                            <asp:TextBox ID="pnameTextBox" runat="server" Text='<%# Bind("pname")
%>' />
                            <br />
                            pdetails:
                            <asp:TextBox ID="pdetailsTextBox" runat="server" Text='<%#
Bind("pdetails") %>' />
                            <br />
                            price:
                            <asp:TextBox ID="priceTextBox" runat="server" Text='<%# Bind("price")
%>' />
                            <br />
                            quantity:
                            <asp:TextBox ID="quantityTextBox" runat="server" Text='<%#
Bind("quantity") %>' />
                            <br />
                            <asp:Button ID="UpdateButton" runat="server" CommandName="Update"
Text="Update" />
                            <asp:Button ID="CancelButton" runat="server" CommandName="Cancel"
Text="Cancel" />
                          </td>
                        </EditItemTemplate>
                        <EmptyDataTemplate>
```

```
                    <table style="background-color: #FFFFFF;border-collapse: collapse;border-
color: #999999;border-style:none;border-width:1px;">
                        <tr>
                            <td>No data was returned.</td>
                        </tr>
                    </table>
                </EmptyDataTemplate>
                <InsertItemTemplate>
                    <td runat="server" style="">pid:
                        <asp:TextBox ID="pidTextBox" runat="server" Text='<%# Bind("pid") %>'
/>
                        <br />pname:
                        <asp:TextBox ID="pnameTextBox" runat="server" Text='<%# Bind("pname")
%>' />
                        <br />pdetails:
                        <asp:TextBox ID="pdetailsTextBox" runat="server" Text='<%#
Bind("pdetails") %>' />
                        <br />price:
                        <asp:TextBox ID="priceTextBox" runat="server" Text='<%# Bind("price")
%>' />
                        <br />quantity:
                        <asp:TextBox ID="quantityTextBox" runat="server" Text='<%#
Bind("quantity") %>' />
                        <br />
                        <asp:Button ID="InsertButton" runat="server" CommandName="Insert"
Text="Insert" />
                        <asp:Button ID="CancelButton" runat="server" CommandName="Cancel"
Text="Clear" />
                    </td>
                </InsertItemTemplate>
                <ItemTemplate>
                    <td runat="server" style="background-color:#FFFBD6; color: #333333;">pid:
                        <asp:Label ID="pidLabel" runat="server" Text='<%# Eval("pid") %>' />
                        <br />
                        pname:
                        <asp:Label ID="pnameLabel" runat="server" Text='<%# Eval("pname") %>'
/>
                        <br />
                        pdetails:
                        <asp:Label ID="pdetailsLabel" runat="server" Text='<%# Eval("pdetails")
%>' />
                        <br />
                        price:
                        <asp:Label ID="priceLabel" runat="server" Text='<%# Eval("price") %>' />
                        <br />
                        quantity:
                        <asp:Label ID="quantityLabel" runat="server" Text='<%# Eval("quantity")
%>' />
                        <br />
                    </td>
                </ItemTemplate>
```

```
<LayoutTemplate>
    <table runat="server" border="1" style="background-color: #FFFFFF;border-
collapse: collapse;border-color: #999999;border-style:none;border-width:1px;font-family:
Verdana, Arial, Helvetica, sans-serif;">
        <tr id="itemPlaceholderContainer" runat="server">
            <td id="itemPlaceholder" runat="server"></td>
        </tr>
    </table>
    <div style="text-align: center;background-color: #FFCC66; font-family:
Verdana, Arial, Helvetica, sans-serif;color: #333333;">
    </div>
</LayoutTemplate>
<SelectedItemTemplate>
    <td runat="server" style="background-color:#FFCC66; font-weight: bold;color:
#000080;">pid:
        <asp:Label ID="pidLabel" runat="server" Text='<%# Eval("pid") %>' />
        <br />
        pname:
        <asp:Label ID="pnameLabel" runat="server" Text='<%# Eval("pname") %>'
/>
        <br />
        pdetails:
        <asp:Label ID="pdetailsLabel" runat="server" Text='<%# Eval("pdetails")
%>' />
        <br />
        price:
        <asp:Label ID="priceLabel" runat="server" Text='<%# Eval("price") %>' />
        <br />
        quantity:
        <asp:Label ID="quantityLabel" runat="server" Text='<%# Eval("quantity")
%>' />
        <br />
    </td>
</SelectedItemTemplate>
</asp:ListView>
<asp:SqlDataSource ID="SqlDataSource5" runat="server" ConnectionString="<%$
ConnectionStrings:prodConString %>" SelectCommand="SELECT * FROM
[productDetails]"></asp:SqlDataSource>
<br />
<br />
<asp:Label ID="Label12" runat="server" Font-Bold="True" Font-Italic="True" Font-
Size="Large" Text="Repeater Control"></asp:Label>
<br />
<br />
<asp:Repeater ID="Repeater1" runat="server" DataSourceID="SqlDataSource6">

<HeaderTemplate>
    <table border="1">
        <tr>
            <th scope="col" style="width:90px">
            ProdID
```

```
                    </th>
                    <th scope="col" style="width:90px">
                    ProdName
                    </th>
                    <th scope="col" style="width:90px">
                    ProdDetails
                    </th>
                     <th scope="col" style="width:90px">
                    ProdPrice
                    </th>
                     <th scope="col" style="width:90px">
                    ProdQuantity
                    </th>
                </tr>


            <br />
            </HeaderTemplate>
           <ItemTemplate>
             <tr>
              <td> <asp:Label ID="pidLabel" runat="server" Text='<%# Eval("pid") %>'
/></td>
                 <td><asp:Label ID="pnameLabel" runat="server" Text='<%# Eval("pname")
%>' /></td>
                 <td><asp:Label ID="pdetailsLabel" runat="server" Text='<%# Eval("pdetails")
%>' /></td>
                 <td><asp:Label ID="priceLabel" runat="server" Text='<%# Eval("price") %>'
/></td>
                 <td><asp:Label ID="quantityLabel" runat="server" Text='<%# Eval("quantity")
%>' /></td>
                </tr>
            </ItemTemplate>
            <FooterTemplate>
               </table>
            </FooterTemplate>
        </asp:Repeater >

        <asp:SqlDataSource ID="SqlDataSource6" runat="server" ConnectionString="<%$
ConnectionStrings:prodConString %>" SelectCommand="SELECT * FROM
[productDetails]"></asp:SqlDataSource>
        <br />


        <br />
        </div>
    </form>
</body>
</html>
```

- **OUTPUT :**

Data Bound Controls

Data List Control

pid: 101
pname: Pencil
pdetails: Apsara
price: 10
quantity: 50

pid: 102
pname: NoteBook
pdetails: CLASSMATE
price: 150
quantity: 100

pid: 103
pname: Soap
pdetails: DOVE
price: 50
quantity: 50

pid: 104
pname: Laptop
pdetails: DELL
price: 50000
quantity: 10

pid: 105
pname: Speaker
pdetails: SONY
price: 20000
quantity: 5

Details View Control

pid	101
pname	Pencil
pdetails	Apsara
price	10
quantity	50

Form View Control

pid: 101
pname: Pencil
pdetails: Apsara
price: 10
quantity: 50

Grid View Control

pid	pname	pdetails	price	quantity
101	Pencil	Apsara	10	50
102	NoteBook	CLASSMATE	150	100
103	Soap	DOVE	50	50
104	Laptop	DELL	50000	10
105	Speaker	SONY	20000	5

List View Control

pid: 101	pid: 102	pid: 103	pid: 104	pid: 105
pname: Pencil	pname: NoteBook	pname: Soap	pname: Laptop	pname: Speaker
pdetails: Apsara	pdetails: CLASSMATE	pdetails: DOVE	pdetails: DELL	pdetails: SONY
price: 10	price: 150	price: 50	price: 50000	price: 20000
quantity: 50	quantity: 100	quantity: 50	quantity: 10	quantity: 5

Repeater Control

ProdID	ProdName	ProdDetails	ProdPrice	ProdQuantity
101	Pencil	Apsara	10	50
102	NoteBook	CLASSMATE	150	100
103	Soap	DOVE	50	50
104	Laptop	DELL	50000	10
105	Speaker	SONY	20000	5

Que.5. Design asp.net web form to search all words with length is less than five characters from string array using LINQ.

Ans:

- **Code –
WF_LINQ.aspx**
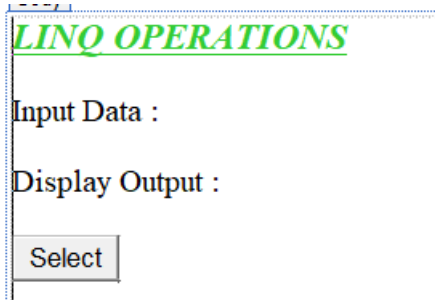

```
<%@ Page Language="C#" AutoEventWireup="true" CodeBehind="WF_LINQ.aspx.cs"
Inherits="PracticalNo03.WF_LINQ" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
    <title></title>
</head>
<body>
    <form id="form1" runat="server">
        <div style="height: 268px">
            <asp:Label ID="Label1" runat="server" Font-Bold="True" Font-Italic="True" Font-
Size="Large" Font-Underline="True" ForeColor="#33CC33" Text="LINQ
OPERATIONS"></asp:Label>
            <br />
            <br />
            <asp:Label ID="lblInputData" runat="server" Text="Input Data : "></asp:Label>
            <br />
            <br />
            <asp:Label ID="lblAns" runat="server" Text="Display Output : "></asp:Label>
            <br />
            <br />
            <asp:Button ID="btnSelect" runat="server" OnClick="btnSelect_Click" Text="Select" />
        </div>
    </form>
</body>
</html>
```

WF_LINQ.aspx.cs

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

```
using System.Web;
using System.Web.UI;
using System.Web.UI.WebControls;

namespace PracticalNo03
{
    public partial class WF_LINQ : System.Web.UI.Page
    {
        protected void Page_Load(object sender, EventArgs e)
        {

        }

        protected void btnSelect_Click(object sender, EventArgs e)
        {
            //Specify the data Source
            string[] my_words = { "hello", "wonderful", "LINQ", "beautiful", "world" };

            foreach(string s in my_words)
            {
                lblInputData.Text = lblInputData.Text + " " + s;
            }
            //define the query expression.//Get only shorts word
            var shortWords = from word in my_words where word.Length <= 5 select word;

            //Execute the query.//Print each word out
            foreach(var word in shortWords)
            {
                lblAns.Text = lblAns.Text + " " + word;
            }
        }
    }
}
```

- **OUTPUT :**

https://localhost:44355/WF_LINQ.aspx

LINQ OPERATIONS

Input Data : hello wonderful LINQ beautiful world

Display Output : hello LINQ world
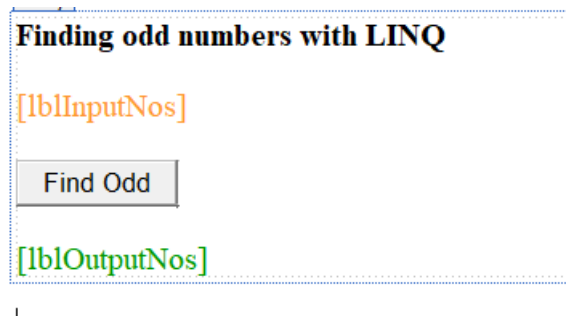
Select
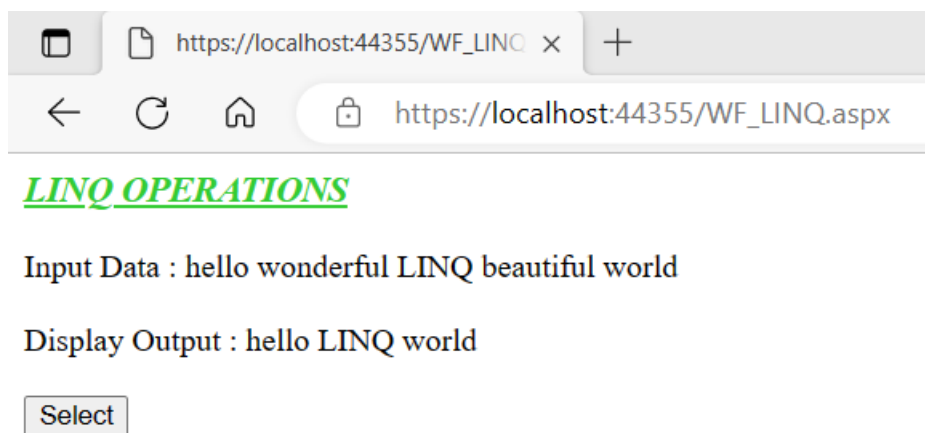
Que.6. Design asp.net web form to find odd numbers from integer Array using LINQ.

Ans:

- **Code –**
  WF_OddNum_LINQ.aspx

Finding odd numbers with LINQ

[lblInputNos]

```
Find Odd
```

[lblOutputNos]

```
<%@ Page Language="C#" AutoEventWireup="true" CodeBehind="WF_OddNum_LINQ.aspx.cs"
Inherits="PracticalNo03.WF_OddNum_LINQ" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
    <title>Odd Numbers</title>
</head>
<body>
    <form id="form1" runat="server">
        <div>
            <asp:Label ID="lblHeading" runat="server" Font-Bold="True" Font-Size="Medium"
Text="Finding odd numbers with LINQ"></asp:Label>
            <br />
            <br />
            <asp:Label ID="lblInputNos" runat="server" ForeColor="#FF9933"></asp:Label>
            <br />
            <br />
            <asp:Button ID="btnFindOdd" runat="server" OnClick="btnFindOdd_click" Text="Find
Odd" />
            <br />
            <br />
            <asp:Label ID="lblOutputNos" runat="server" ForeColor="#009900"></asp:Label>

        </div>
    </form>
</body>
</html>
```

WF_OddNum_LINQ.aspx.cs

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

```
using System.Web;
using System.Web.UI;
using System.Web.UI.WebControls;

namespace PracticalNo03
{
    public partial class WF_OddNum_LINQ : System.Web.UI.Page
    {
        int[] numbers = new int[7] { 1, 2, 3, 4, 5, 6, 7 };
        protected void Page_Load(object sender, EventArgs e)
        {
            lblInputNos.Text = "Input Numbers : ";


            foreach (int n in numbers)
            {
                lblInputNos.Text = lblInputNos.Text + " " + n;
            }

        }

        protected void btnFindOdd_click(object sender, EventArgs e)
        {
            IEnumerable<int> numQuery = from num in numbers
                        where (num % 2) != 0
                        select num;

            lblOutputNos.Text = "Odd Numbers: ";
            foreach (int n in numQuery)
            { lblOutputNos.Text = lblOutputNos.Text + " " + n.ToString(); }
        }

    }
}
```

- **OUTPUT :**
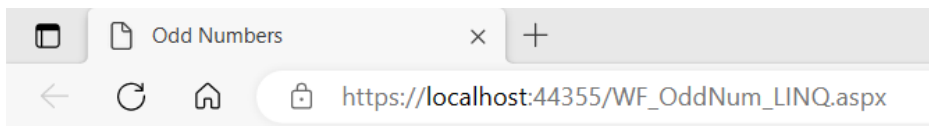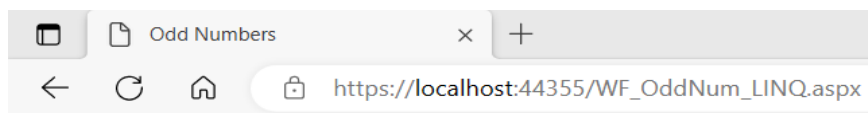
Que.7. Design asp.net web application to perform add, update, delete and search operations on emp_info Table using LINQ to SQL.

Ans:

- **Code –**
  WF_LINQ_DB.aspx


```
<%@ Page Language="C#" AutoEventWireup="true" CodeBehind="WF_LINQ_DB.aspx.cs"
Inherits="PracticalNo03.WF_LINQ_DB" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
   <title></title>
</head>
<body>
   <form id="form1" runat="server">
     <div>
        <asp:Label ID="Label1" runat="server" Font-Bold="True" Font-Size="X-Large"
ForeColor="#FF66FF" Text=" LINQ TO SQL"></asp:Label>
        <br />
        <br />
        <asp:Label ID="Label2" runat="server" Text="Enter Your Roll no : "></asp:Label>
        <asp:TextBox ID="txtRollNo" runat="server" Height="19px"></asp:TextBox>
        <br />

     <asp:Label ID="Label3" runat="server" Text="Enter Your Name : "></asp:Label>
```

```
        <asp:TextBox ID="txtName" runat="server" style="margin-bottom: 3px"
Height="20px"></asp:TextBox>

        <br />

        <asp:Label ID="Label4" runat="server" Text="Enter Your Address : "></asp:Label>
        <asp:TextBox ID="txtAddress" runat="server"></asp:TextBox>


        <br />


        <br />


    <asp:GridView ID="gvStudDetails" runat="server">
    </asp:GridView>
        <br />

<asp:Label ID="lblMessage" runat="server" Text="Message"></asp:Label>

        <br />
        <br />

        <asp:Button ID="btnAdd" runat="server"  Text="Add" OnClick="btnAdd_Click" />

           
        <asp:Button ID="btnDelete" runat="server"  Text="Delete" OnClick="btnDelete_Click" />
 
        <asp:Button ID="btnUpdate" runat="server"  Text="Update" OnClick="btnUpdate_Click" />
 
        <asp:Button ID="btnSearch" runat="server"  Text="Search" OnClick="btnSearch_Click" />
 

        <br />
        <br />
    </div>
   </form>
</body>
</html>
```

WF_LINQ_DB.aspx.cs

```
using System;
using System.Collections.Generic;
using System.Linq;
using System.Web;
using System.Web.UI;
using System.Web.UI.WebControls;

namespace PracticalNo03
{
   public partial class WF_LINQ_DB : System.Web.UI.Page
   {
```

```csharp
DataClasses1DataContext dc = new DataClasses1DataContext();
public void clearTextBox()
{
    txtRollNo.Text = " ";
    txtName.Text = " ";
    txtAddress.Text = " ";
}
public void showData()
{
    try
    {
        var q = from a in dc.GetTable<stud>() select a;
        gvStudDetails.DataSource = q;
        gvStudDetails.DataBind();
    }
    catch(Exception ex)
    {
        lblMessage.Text = "Exception caught!! " + ex.Message;
    }
}

    protected void Page_Load(object sender, EventArgs e)
{
    showData();
}

protected void btnAdd_Click(object sender, EventArgs e)
{
    try
    {
        stud objAdd = new stud();

        objAdd.rollno = Convert.ToByte(txtRollNo.Text);
        objAdd.name = Convert.ToString(txtName.Text);
        objAdd.address = Convert.ToString(txtAddress.Text);

        dc.studs.InsertOnSubmit(objAdd);
        dc.SubmitChanges();
        lblMessage.Text = "Record Inserted Successfully!!";
    }
    catch(Exception ex)
    {
        lblMessage.Text = "Exception caught!! " + ex.Message;
    }
    finally
    {
        clearTextBox();
        showData();
    }
}

protected void btnDelete_Click(object sender, EventArgs e)
{
    try
    {
```

```csharp
        stud objDel = dc.studs.Single(stud => stud.rollno == Convert.ToInt16(txtRollNo.Text));

            dc.studs.DeleteOnSubmit(objDel);

        dc.SubmitChanges();
        lblMessage.Text = "Record Delete Successfully!!";

    }
    catch (Exception ex)
    {
        lblMessage.Text = "Exception caught!! " + ex.Message;
    }
    finally
    {
        clearTextBox();
        showData();
    }
}

protected void btnUpdate_Click(object sender, EventArgs e)
{

    try
    {
        stud objUpdate = dc.studs.Single(stud => stud.rollno == Convert.ToInt16(txtRollNo.Text));
        //Field which will be update
        objUpdate.name = Convert.ToString(txtName.Text);
        objUpdate.address = Convert.ToString(txtAddress.Text);

        dc.SubmitChanges();
        clearTextBox();
        lblMessage.Text = "Record Update Successfully!!";
    }
    catch (Exception ex)
    {
        lblMessage.Text = "Exception caught!! " + ex.Message;
    }
    finally
    {
        showData();
    }
}

protected void btnSearch_Click(object sender, EventArgs e)
{

    try
    {

        stud objSearch = dc.studs.Single(stud => stud.rollno == Convert.ToInt16(txtRollNo.Text));
        txtRollNo.Text = Convert.ToString(objSearch.rollno);
        txtName.Text = objSearch.name;
        txtAddress.Text = objSearch.address;
        lblMessage.Text = "Record Found Successfully";
```

```
            }
            catch (Exception ex)
            {
                lblMessage.Text = "Exception caught!! " + ex.Message;
            }
            finally
            {
                showData();
            }
        }
    }

        }
```

- **OUTPUT :**

LINQ TO SQL

Enter Your Roll no :
Enter Your Name :
Enter Your Address :

rollno	name	address
11	Sakshi	Satara
12	Shreya	Ratnagiri
13	Vaishnavi	Satara
14	Rupesh	Pune
15	Shubham	Mumbai
16	Varad	Satara
17	Radha	Karad
18	Ritesh	Nimsod
19	Nimish	Sangali

Record Inserted Successfully!!

Add   Delete   Update   Search

LINQ TO SQL

Enter Your Roll no :
Enter Your Name :
Enter Your Address :

rollno	name	address
11	Sakshi	Satara
12	Shreya	Ratnagiri
13	Vaishnavi	Satara
14	Rupesh	Pune
15	Shubham	Mumbai
17	Radha	Karad
18	Ritesh	Nimsod
19	Nimish	Sangali

Record Delete Successfully!!

Add   Delete   Update   Search

LINQ TO SQL

Enter Your Roll no :
Enter Your Name :
Enter Your Address :

rollno	name	address
11	Sakshi	Satara
12	Shreya	Ratnagiri
13	Vaishnavi	Satara
14	Rupesh	Pune
15	Shubham	Mumbai
17	Vaibhav	Nagpur
18	Ritesh	Nimsod
19	Nimish	Sangali

Record Update Successfully!!

Add   Delete   Update   Search

LINQ TO SQL

Enter Your Roll no : 14
Enter Your Name : Rupesh
Enter Your Address : Pune

rollno	name	address
11	Sakshi	Satara
12	Shreya	Ratnagiri
13	Vaishnavi	Satara
14	Rupesh	Pune
15	Shubham	Mumbai
17	Vaibhav	Nagpur
18	Ritesh	Nimsod
19	Nimish	Sangali

Record Found Successfully

Add   Delete   Update   Search

Que.8. Design asp.net web application to perform add, update, delete and search operations on ProductDetails Table using Entity Framework.

Ans:

- **Code –**

    WF_ProductDetailsEntityFramework.aspx


```
<%@ Page Language="C#" AutoEventWireup="true"
CodeBehind="WF_ProductDetailsEntityFramework.aspx.cs"
Inherits="PracticalNo03.WF_ProductDetailsEntityFramework" %>

<!DOCTYPE html>

<html xmlns="http://www.w3.org/1999/xhtml">
<head runat="server">
    <title>Product Details</title>
</head>
<body>
    <form id="form1" runat="server">
        <div>
            <asp:Label ID="Label1" runat="server" Text="Product Information" Font-Size="X-Large"
ForeColor="#CC33FF"></asp:Label>

            <br />
            <br />

        <asp:Label ID="Label2" runat="server" Text="Enter Product id : "></asp:Label>
        <asp:TextBox ID="txtPid" runat="server" Height="19px"></asp:TextBox>
        <br />
```

```
        <asp:Label ID="Label3" runat="server" Text="Enter Product Name : "></asp:Label>

        <asp:TextBox ID="txtPname" runat="server" style="margin-bottom: 3px"
Height="20px"></asp:TextBox>

            <br />

            <asp:Label ID="Label4" runat="server" Text="Enter Product Details : "></asp:Label>
            <asp:TextBox ID="txtDetails" runat="server"></asp:TextBox>



            <br />
            <asp:Label ID="Label5" runat="server" Text="Enter Product Price : "></asp:Label>
              <asp:TextBox ID="txtPrice" runat="server" Width="179px"></asp:TextBox>

        <br />
            <asp:Label ID="Label6" runat="server" Text="Enter Product Quantity : "></asp:Label>
              
            <asp:TextBox ID="txtQuantity" runat="server" Width="179px"></asp:TextBox>



            <br />
            <br />
            <asp:GridView ID="gvProductDetails" runat="server">
            </asp:GridView>
            <br />



<asp:Label ID="lblMessage" runat="server" Text="Message"></asp:Label>

            <br />
            <br />

            <asp:Button ID="btnAdd" runat="server" Text="Add" OnClick="btnAdd_Click"  />

               
            <asp:Button ID="btnDelete" runat="server"  Text="Delete" OnClick="btnDelete_Click"  />
 
            <asp:Button ID="btnUpdate" runat="server" Text="Update" OnClick="btnUpdate_Click"  />
 
            <asp:Button ID="btnSearch" runat="server"  Text="Search" OnClick="btnSearch_Click" />
 

            <br />
            <br />
        </div>
    </form>
</body>
</html>
```
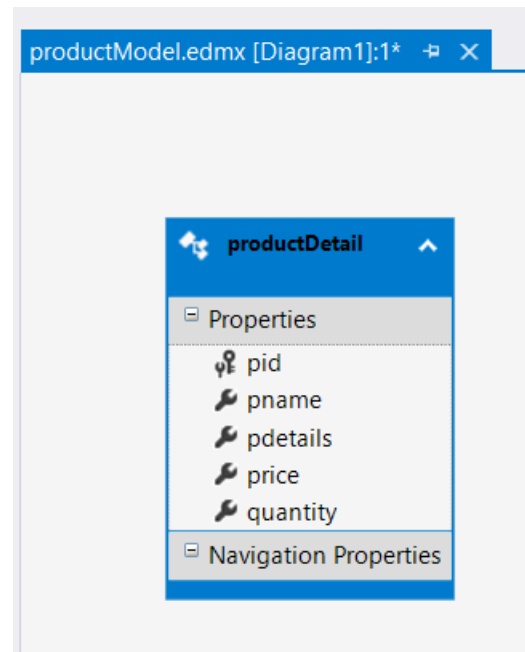
WF_ProductDetailsEntityFramework.aspx.cs

```csharp
using System;
using System.Collections.Generic;
using System.Linq;
using System.Web;
using System.Web.UI;
using System.Web.UI.WebControls;

namespace PracticalNo03
{
    public partial class WF_ProductDetailsEntityFramework : System.Web.UI.Page
    {
        productDBEntities1 p1 = new productDBEntities1();
        public void clearTextBox()
        {
            txtPid.Text = " ";
            txtPname.Text = " ";
            txtDetails.Text = " ";
            txtPrice.Text = " ";
            txtQuantity.Text = " ";
        }
        public void showData()
        {
            try
            {
                gvProductDetails.DataSource = p1.productDetails.ToList();
                gvProductDetails.DataBind();
            }
            catch (Exception ex)
            {
                lblMessage.Text = "Exception Caught!!" + ex.Message;
            }
        }
        protected void Page_Load(object sender, EventArgs e)
        {
            showData();

        }

        protected void btnAdd_Click(object sender, EventArgs e)
        {

            try
            {
                productDetail productObjAdd = new productDetail();

                productObjAdd.pid = (byte)Convert.ToInt32(txtPid.Text);
                productObjAdd.pname = txtPname.Text;
                productObjAdd.pdetails = txtDetails.Text;
                productObjAdd.price = Convert.ToInt32(txtPrice.Text);
                productObjAdd.quantity = Convert.ToInt32(txtQuantity.Text);
```

```csharp
        p1.productDetails.Add(productObjAdd);
        p1.SaveChanges();
        lblMessage.Text = "Record Added Successfully!!";
        showData();
        clearTextBox();
      }
    catch (Exception ex)
    {
        lblMessage.Text = "Exception Caught!!" + ex.Message;
    }
}

protected void btnDelete_Click(object sender, EventArgs e)
{
    try
    {
        productDetail productObjDelete = p1.productDetails.Find(Convert.ToInt32(txtPid.Text));
        if (productObjDelete != null)
        {
            p1.productDetails.Remove(productObjDelete);
            p1.SaveChanges();

            lblMessage.Text = "Recored Deleted Successfully!!";

            showData();
            clearTextBox();
        }
        else
        {
            lblMessage.Text = "Record Not Found!!";
        }
    }
    catch (Exception ex)
    {
        lblMessage.Text = "Exception Caught!!" + ex.Message;
    }
}

protected void btnUpdate_Click(object sender, EventArgs e)
{
    try
    {
        productDetail productObjUpdate = p1.productDetails.Find(Convert.ToInt32(txtPid.Text));
        if (productObjUpdate != null)
        {
            productObjUpdate.pname = txtPname.Text;
            productObjUpdate.pdetails = txtDetails.Text;
            productObjUpdate.price = Convert.ToInt32(txtPrice.Text);
            productObjUpdate.quantity = Convert.ToInt32(txtQuantity.Text);

            p1.SaveChanges();

            lblMessage.Text = "Recored Updated Successfully!!";
            showData();
            clearTextBox();
```

```csharp
            }
            else
            {
                lblMessage.Text = "Record Not Found!";
            }
        }
        catch (Exception ex)
        {
            lblMessage.Text = "Exception Caught!!" + ex.Message;
        }
    }

    protected void btnSearch_Click(object sender, EventArgs e)
    {
        try
        {
            productDetail productObjSearch = p1.productDetails.Find(Convert.ToInt32(txtPid.Text));
            if (productObjSearch != null)
            {
                txtPid.Text = Convert.ToString(productObjSearch.pid);
                txtPname.Text = productObjSearch.pname;
                txtDetails.Text = productObjSearch.pdetails;
                txtPrice.Text = Convert.ToString(productObjSearch.price);
                txtQuantity.Text = Convert.ToString(productObjSearch.quantity);
                p1.SaveChanges();

                lblMessage.Text = "Recored Found Successfully!!";
                showData();

            }
            else
            {
                lblMessage.Text = "Record Not Found!";
            }
        }
        catch (Exception ex)
        {
            lblMessage.Text = "Exception Caught!!" + ex.Message;
        }
    }
}
    }
```

- **OUTPUT :**

Product Details — https://localhost:44355/WF_ProductDetailsEntityFramework.aspx

Product Information

Enter Product id :
Enter Product Name :
Enter Product Details :
Enter Product Price :
Enter Product Quantity :

pid	pname	pdetails	price	quantity
101	Pen	TRIMAX	100	50
102	Pencil	NATRAJ	5	100
103	NoteBook	CLASSMATE	150	100
104	Soap	DOVE	50	50
105	Laptop	DELL	50000	10
106	Speaker	SONY	10000	5

Message

Add   Delete   Update   Search

Product Details — https://localhost:44355/WF_ProductDetailsEntityFramework.aspx

Product Information

Enter Product id :
Enter Product Name :
Enter Product Details :
Enter Product Price :
Enter Product Quantity :

pid	pname	pdetails	price	quantity
101	Pen	TRIMAX	100	50
102	Pencil	NATRAJ	5	100
103	NoteBook	CLASSMATE	150	100
104	Soap	DOVE	50	50
105	Laptop	DELL	50000	10
106	Speaker	SONY	10000	5
107	TV	SAMSUNG	50000	2

Record Added Successfully!!

Add   Delete   Update   Search

Product Details — https://localhost:44355/WF_ProductDetailsEntityFramework.aspx

Product Information

Enter Product id :
Enter Product Name :
Enter Product Details :
Enter Product Price :
Enter Product Quantity :

pid	pname	pdetails	price	quantity
102	Pencil	NATRAJ	5	100
103	NoteBook	CLASSMATE	150	100
104	Soap	DOVE	50	50
105	Laptop	DELL	50000	10
106	Speaker	SONY	10000	5
107	TV	SAMSUNG	50000	2

Recored Deleted Successfully!!

Add   Delete   Update   Search

Product Details — https://localhost:44355/WF_ProductDetailsEntityFramework.aspx

Product Information

Enter Product id :
Enter Product Name :
Enter Product Details :
Enter Product Price :
Enter Product Quantity :

pid	pname	pdetails	price	quantity
102	Pencil	Apsara	10	50
103	NoteBook	CLASSMATE	150	100
104	Soap	DOVE	50	50
105	Laptop	DELL	50000	10
106	Speaker	SONY	10000	5
107	TV	SAMSUNG	50000	2

Recored Updated Successfully!!

Add   Delete   Update   Search

Product Details — https://localhost:44355/WF_ProductDetailsEntityFramework.aspx

Product Information

Enter Product id : 105
Enter Product Name : Laptop
Enter Product Details : DELL
Enter Product Price : 50000
Enter Product Quantity : 10

pid	pname	pdetails	price	quantity
102	Pencil	Apsara	10	50
103	NoteBook	CLASSMATE	150	100
104	Soap	DOVE	50	50
105	Laptop	DELL	50000	10
106	Speaker	SONY	10000	5
107	TV	SAMSUNG	50000	2

Recored Found Successfully!!

Add   Delete   Update   Search