Entity Framework Core Assignments Day 01

Puneeth Puligundla 20249

1. SELECT AND ADD USING DB FIRST

using System;

using EFSamples.Models;

using System.Linq;

namespace EFSamples

{

class Program

{

static void Main(string[] args)

{

//GetEmpsByDeptNo(10);

//GetMaxEmpSal();

//GetSumOfSalByDept(10);

//GetEmpDetailsByStartLetter("J");

//AddNewEmp();

RemoveEmpFromRecord();

Console.ReadLine();

}

/// <summary>

/// Get Emp Details by supplying a start letter

/// </summary>

private static void GetEmpDetailsByStartLetter(string str)

{

var ctx = new AugETG\_2021Context();

var emps = ctx.Emps.Where(e => e.Ename.StartsWith(str)).OrderBy(e => e.Ename);

foreach (var e in emps)

{

Console.WriteLine(e.Ename);

}

}

/// <summary>

/// Get Dept Salary

/// </summary>

private static void GetSumOfSalByDept(int dno)

{

var ctx = new AugETG\_2021Context();

var emps = ctx.Emps.Where(e=>e.Deptno==dno).Select(e => e.Sal).Sum();

Console.WriteLine("The Sum of sal in deptno "+dno+"is "+emps);

}

/// <summary>

/// Get Max Sal in EMP Table

/// </summary>

private static void GetMaxEmpSal()

{

var ctx = new AugETG\_2021Context();

var emps = ctx.Emps.Select(e => e.Sal).Max();

Console.WriteLine("Max Sal in emp table is "+emps);

}

/// <summary>

/// Get Emp Details by dept

/// </summary>

private static void GetEmpsByDeptNo(int dno)

{

var ctx = new AugETG\_2021Context();

var emps = ctx.Emps.Where(e => e.Deptno == dno).OrderBy(e => e.Deptno);

foreach (var e in emps)

{

Console.WriteLine(e.Empno+" "+e.Ename+" "+e.Deptno);

}

}

/// <summary>

/// Add new emp to emp table

/// </summary>

private static void AddNewEmp()

{

var ctx = new AugETG\_2021Context();

Emp e1 = new Emp();

e1.Empno = 20249;

e1.Ename = "Puneeth";

e1.Deptno = 10;

e1.Comm = 500;

e1.Sal = 1000;

e1.Job = "TTS";

e1.Mgr = 7369;

try

{

ctx.Emps.Add(e1);

ctx.SaveChanges();

Console.WriteLine("New Employee added Successfully");

}

catch (Exception e)

{

Console.WriteLine(e.InnerException.ToString());

}

}

/// <summary>

/// Removing an employee from the records

/// </summary>

private static void RemoveEmpFromRecord()

{

var ctx = new AugETG\_2021Context();

var emps = ctx.Emps.Where(e => e.Empno == 20249).First();

try

{

ctx.Emps.Remove(emps);

ctx.SaveChanges();

Console.WriteLine("Record with empno 20249 has been removed");

}

catch (Exception e)

{

Console.WriteLine(e.InnerException.ToString());

}

}

///<summary>

/// Update Record in EMP table

/// </summary>

private static void UpdateDetailFromRecord(int eid)

{

var ctx = new AugETG\_2021Context();

var emp = ctx.Emps.Where(e => e.Empno ==eid).SingleOrDefault();

emp.Ename = "Smith";

emp.Sal = 4500; //Updating salary

emp.Deptno = 10; //Updating Department

emp.Job = "TTS"; //Updating Job

try

{

ctx.Emps.Update(emp);

ctx.SaveChanges();

Console.WriteLine("Details Updated");

}

catch (Exception ex)

{

Console.WriteLine(ex.InnerException.ToString());

}

}

///<summary>

/// Calling Stored Procedures

/// </summary>

private static void GetAllEmpDetails\_SP()

{

var ctx = new AugETG\_2021Context();

try

{

var emps = ctx.Set<Emp>().FromSqlRaw("GetAllEmpDetails").ToList();

foreach (var emp in emps)

{

Console.WriteLine(emp.Ename+" draws "+emp.Sal);

}

}catch(Exception e)

{

Console.WriteLine(e.InnerException.ToString());

}

}

///<summary>

/// Update using Stored Procedures

/// </summary>

private static void UpdateEmpName\_SP()

{

var ctx = new AugETG\_2021Context();

try

{

ctx.Database.ExecuteSqlRaw("UpdateEmpNamebyEmpno @p0,@p1", 7844, "Ashton");

Console.WriteLine("Update Done");

}

catch(Exception e)

{

Console.WriteLine(e.InnerException.ToString());

}

}

///<summary>

/// DELETE using Stored Procedures

/// </summary>

private static void DelByEmpNo\_SP()

{

var ctx = new AugETG\_2021Context();

try

{

ctx.Database.ExecuteSqlRaw("DeleteEmpNamebyEmpno @p0", 20249);

Console.WriteLine("Delete Done");

}

catch (Exception e)

{

Console.WriteLine(e.InnerException.ToString());

}

}

/// <summary>

/// Stored Procedure With in parameter

/// </summary>

private static void UpdateEmpName\_Sp\_WithParam()

{

var ctx = new AugETG\_2021Context();

var param = new SqlParameter[]

{

new SqlParameter()

{

ParameterName="@empno",

SqlDbType = System.Data.SqlDbType.Int,

Size=100,

Direction=System.Data.ParameterDirection.Input,

Value=7844

},

new SqlParameter()

{

ParameterName="@newname",

SqlDbType=System.Data.SqlDbType.VarChar,

Size=10,

Direction=System.Data.ParameterDirection.Input,

Value="Puneeth"

}

};

try

{

var res = ctx.Database.ExecuteSqlRaw("UpdateEmpByEmpno @empno,@newname", param);

Console.WriteLine("Done");

}

catch(Exception e)

{

Console.WriteLine(e.InnerException.ToString());

}

}

}

}