**Section01 Identity in .net core**

**Notes:-**

**1-we will use identity that represent the interface of collection of interaction with identity tables such as users and roles that inside it we can apply identity claims inside it.**

**We will install the following packages:**

**//used for the connection with the database**

**Microsoft.EntityFrameworkCore**

**//used to store on the database memory**

**Microsoft.EntityFrameworkCore.InMemory**

**//used for the identity functionality with the entity framework (the bridge between them)**

**Microsoft.AspNetCore.Identity.EntityFrameworkCore**

**2-in order to make communicate the entity framework context with the identity we have to make the following steps:-**

**1-on the project install the package called**

**Microsoft.AspNetCore.Identity.EntityFrameworkCore**

**//this package contains the identity for the entity framework core that we used to communicate with the Entity framework context**

**2-on the AppDbContext we make the below change**

**using Microsoft.AspNetCore.Identity.EntityFrameworkCore;**

**using Microsoft.EntityFrameworkCore;**

**namespace IdentityExample.Data{**

**//allow to communicate with the Identity tables such as users , roles to apply the general functions such as logoin , signup , signin**

**public class AppDbContext : IdentityDbContext{**

**public AppDbContext(DbContextOptions<AppDbContext> options) : base(options){}}}**

**3-on the startup we set the following code on the ConfigureService as below**

**public void ConfigureServices(IServiceCollection services){**

**//Database Layer**

**//initialize part with the database on the memory (communication with the database)**

**services.AddDbContext<AppDbContext>(config =>{**

**config.UseInMemoryDatabase("Memory");});**

**//Identity Layer**

**//we inject identity repostiories that is interface of method collection to interact with the Identity**

**//AddDefaultTokenProviders: is the default Token providers that used to generate Tokens when**

**//reset password , change emial , etc..**

**services.AddIdentity<IdentityUser, IdentityRole>()**

**//used to link the database with the identity tables as below**

**.AddEntityFrameworkStores<AppDbContext>()**

**.AddDefaultTokenProviders();}**

**4-**