

RSCG nr 20 : NetEscapades.EnumGenerators

Info

Nuget : <https://www.nuget.org/packages/NetEscapades.EnumGenerators/>

You can find more details at : <https://andrewlock.net/netescapades-enumgenerators-a-source-generator-for-enum-performance/>

Author : Andrew Lock

Source : <https://github.com/andrewlock/NetEscapades.EnumGenerators>

About

How to use

Add reference to the NetEscapades.EnumGenerators in the csproj

```
<Project Sdk="Microsoft.NET.Sdk">

  <PropertyGroup>
    <OutputType>Exe</OutputType>
    <TargetFramework>net7.0</TargetFramework>
    <ImplicitUsings>enable</ImplicitUsings>
    <Nullable>enable</Nullable>
  </PropertyGroup>

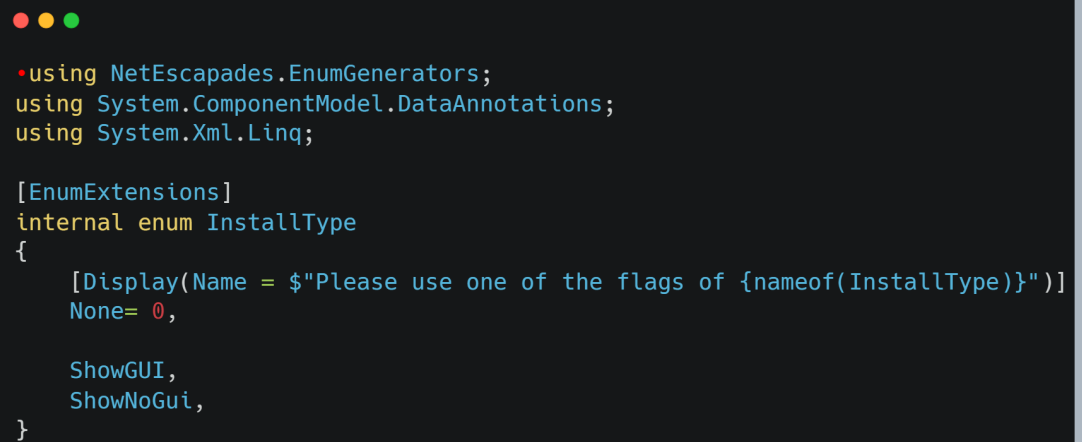
  <ItemGroup>
    <PackageReference Include="NetEscapades.EnumGenerators" Version="1.0.0-beta08"
      OutputItemType="Analyzer" ReferenceOutputAssembly="false"
      PrivateAssets="all" ExcludeAssets="compile;runtime"
    />
  </ItemGroup>
  <PropertyGroup>
    <EmitCompilerGeneratedFiles>true</EmitCompilerGeneratedFiles>

    <CompilerGeneratedFilesOutputPath>$(BaseIntermediateOutputPath)\GX</CompilerGeneratedFilesOutputPath>
  </PropertyGroup>
</Project>
```

This was for me the starting code

I have **coded** the file Program.cs

I have **coded** the file InstallType.cs

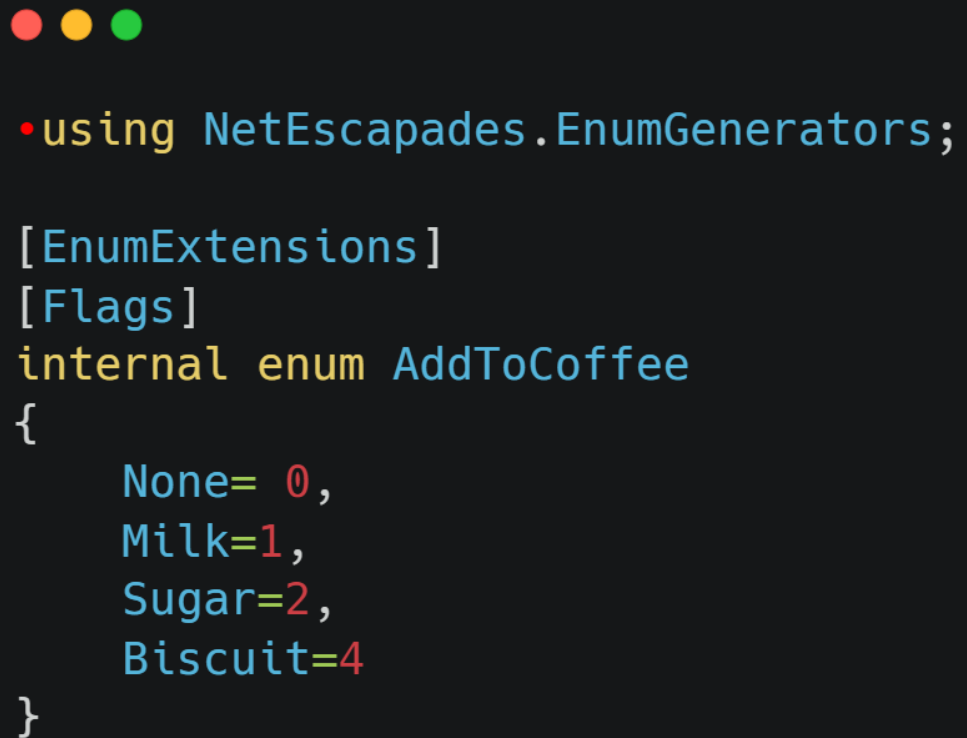


```
•using NetEscapades.EnumGenerators;
using System.ComponentModel.DataAnnotations;
using System.Xml.Linq;

[EnumExtensions]
internal enum InstallType
{
    [Display(Name = $"Please use one of the flags of {nameof(InstallType)}")]
    None= 0,

    ShowGUI,
    ShowNoGui,
}
```

I have **coded** the file AddToCoffee.cs



```
• using NetEscapades.EnumGenerators;  
  
[EnumExtensions]  
[Flags]  
internal enum AddToCoffee  
{  
    None= 0,  
    Milk=1,  
    Sugar=2,  
    Biscuit=4  
}
```

And here are the *generated* files

The file *generated* is AddToCoffeeExtensions_EnumExtensions.g.cs

The file *generated* is EnumExtensionsAttribute.g.cs

```

//-----
// <auto-generated>
//   This code was generated by the NetEscapades.EnumGenerators source generator
//
//   Changes to this file may cause incorrect behavior and will be lost if
//   the code is regenerated.
// </auto-generated>
//-----

#nullable enable

#if NETESCAPADES_ENUMGENERATORS_EMBED_ATTRIBUTES
namespace NetEscapades.EnumGenerators
{
    /// <summary>
    /// Add to enums to indicate that extension methods should be generated for the
    type
    /// </summary>
    [global::System.AttributeUsage(global::System.AttributeTargets.Enum)]
    [global::System.Diagnostics.Conditional("NETESCAPADES_ENUMGENERATORS_USAGES")]
    #if NET5_0_OR_GREATER
    [global::System.Diagnostics.CodeAnalysis.ExcludeFromCodeCoverage(Justification =
"Generated by the NetEscapades.EnumGenerators source generator.")]
    #else
    [global::System.Diagnostics.CodeAnalysis.ExcludeFromCodeCoverage]
    #endif
    public class EnumExtensionsAttribute : global::System.Attribute
    {
        /// <summary>
        /// The namespace to generate the extension class.
        /// If not provided the namespace of the enum will be used
        /// </summary>
        public string? ExtensionClassNamespace { get; set; }

        /// <summary>
        /// The name to use for the extension class.
        /// If not provided, the enum name with "Extensions" will be used.
        /// For example for an Enum called StatusCodes, the default name
        /// will be StatusCodesExtensions
        /// </summary>
        public string? ExtensionClassName { get; set; }
    }
}
#endif

```

The file *generated* is `InstallTypeExtensions_EnumExtensions.g.cs`

You can download the code and this page as pdf from https://ignatandrei.github.io/RSCG_Examples/v2/docs/NetEscapades.EnumGenerators

You can see the whole list at https://ignatandrei.github.io/RSCG_Examples/v2/docs/List-of-RSCG