RSCG nr 12 : AutoCtor

Info

Nuget : https://www.nuget.org/packages/AutoCtor/

You can find more details at :

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Source : https://github.com/distantcam/AutoCtor

About

Generate constructor from non-initialized fields

How to use

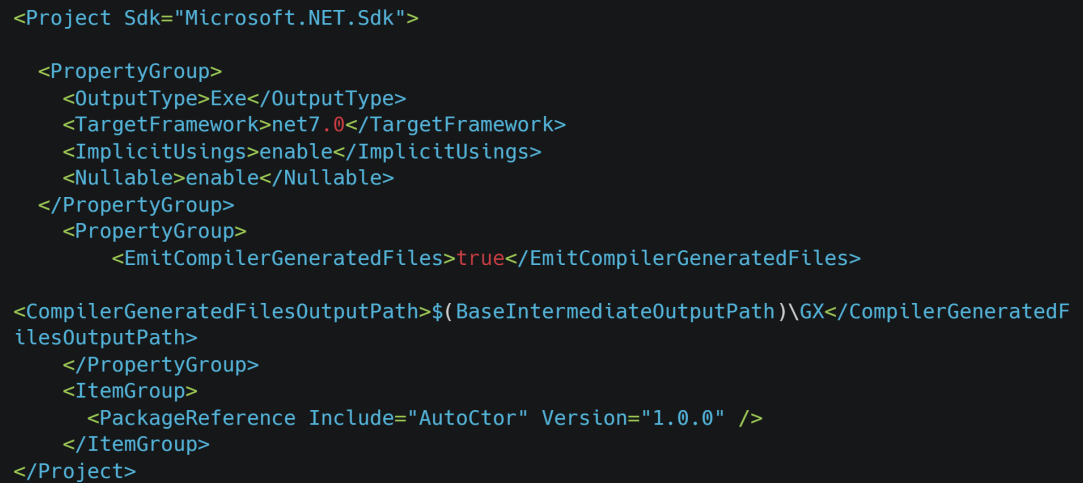### Add reference to the AutoCtor in the csproj

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

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

<CompilerGeneratedFilesOutputPath>$(BaseIntermediateOutputPath)\GX</CompilerGeneratedFilesOutputPath>
    </PropertyGroup>
    <ItemGroup>
      <PackageReference Include="AutoCtor" Version="1.0.0" />
    </ItemGroup>
</Project>
```

This was for me the starting code

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

```
// See https://aka.ms/new-console-template for more information
using AutoCtorDemo;

Console.WriteLine("Hello, World!");

var p = new Person("Andrei", "Ignat");
```

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

```csharp
using AutoCtor;

namespace AutoCtorDemo;

[AutoConstruct]
internal partial class Person
{
    private readonly string FirstName;
    private readonly string? LastName;

}
```

And here are the *generated* files

The file *generated* is AutoConstructAttribute.g.cs

```
•//-----------------------------------------------------------------------
// <auto-generated>
//     This code was generated by https://github.com/distantcam/AutoCtor
//
//     Changes to this file may cause incorrect behavior and will be lost if
//     the code is regenerated.
// </auto-generated>
//-----------------------------------------------------------------------

#if AUTOCTOR_EMBED_ATTRIBUTES
namespace AutoCtor
{
    [System.Runtime.CompilerServices.CompilerGenerated]
    [System.AttributeUsage(AttributeTargets.Class | AttributeTargets.Struct,
AllowMultiple = false, Inherited = false)]
    [System.Diagnostics.Conditional("AUTOCTOR_USAGES")]
    internal sealed class AutoConstructAttribute : System.Attribute
    {
        [System.Runtime.CompilerServices.CompilerGenerated]
        public AutoConstructAttribute()
        {
        }
    }
}
#endif
```

The file *generated* is AutoCtorDemo.Person.g.cs

```
//----------------------------------------------------------------------------
// <auto-generated>
//     This code was generated by https://github.com/distantcam/AutoCtor
//
//     Changes to this file may cause incorrect behavior and will be lost if
//     the code is regenerated.
// </auto-generated>
//----------------------------------------------------------------------------

namespace AutoCtorDemo
{
    partial class Person
    {
        public Person(string FirstName, string LastName)
        {
            this.FirstName = FirstName;
            this.LastName = LastName;
        }
    }
}
```

You can download the code and this page as pdf from https://ignatandrei.gith ub.io/RSCG_Examples/v2/docs/AutoCtor

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