



# Nature Renderer 2021

*Version: 2021.1.6*

The full documentation for Nature Renderer is available online:

<https://visualdesigncafe.com/nature-renderer/docs/2021>

Support	<a href="https://support.visualdesigncafe.com/hc/en-us/requests/new">https://support.visualdesigncafe.com/hc/en-us/requests/new</a>
Changelog	<a href="https://visualdesigncafe.com/nature-renderer/docs/2021/release-notes">https://visualdesigncafe.com/nature-renderer/docs/2021/release-notes</a>
Known Issues	<a href="https://visualdesigncafe.com/nature-renderer/docs/2021/known-issues">https://visualdesigncafe.com/nature-renderer/docs/2021/known-issues</a>

# Quickstart

## Prerequisites

Nature Renderer works by replacing the rendering system for Unity's terrain details and trees. To be able to use Nature Renderer you first need to add a terrain to your scene or open a scene with an existing terrain.

For more details on Terrains see the [Unity documentation](#).

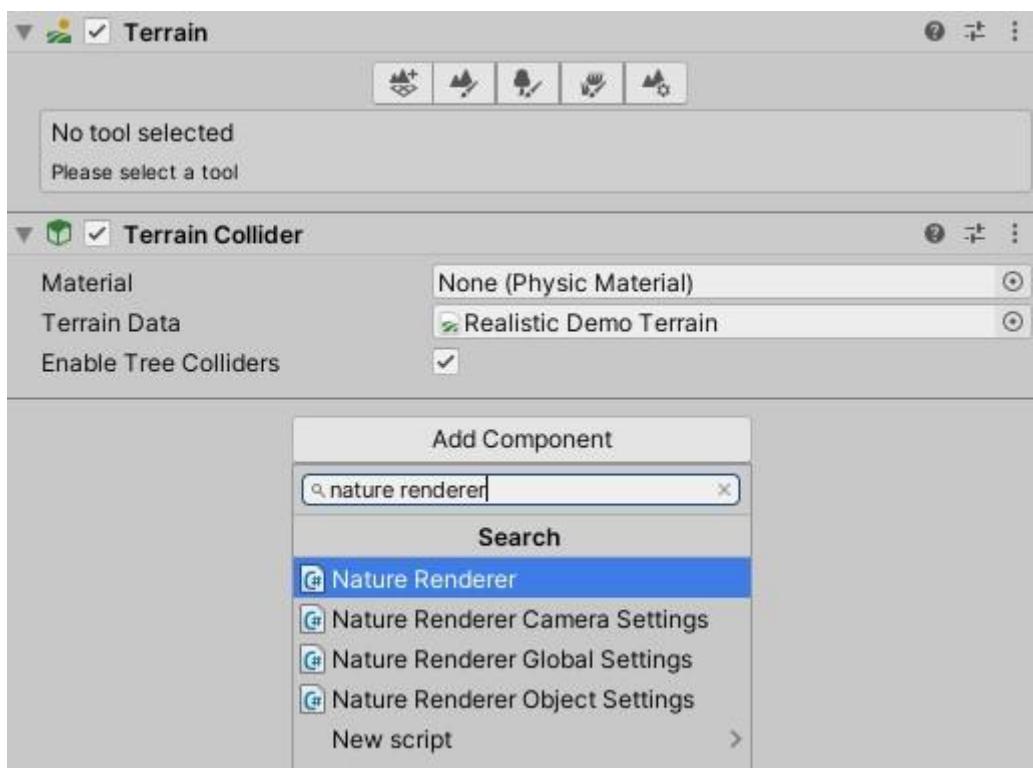


*Existing terrain without Nature Renderer*

## Step 1: Enable Nature Renderer

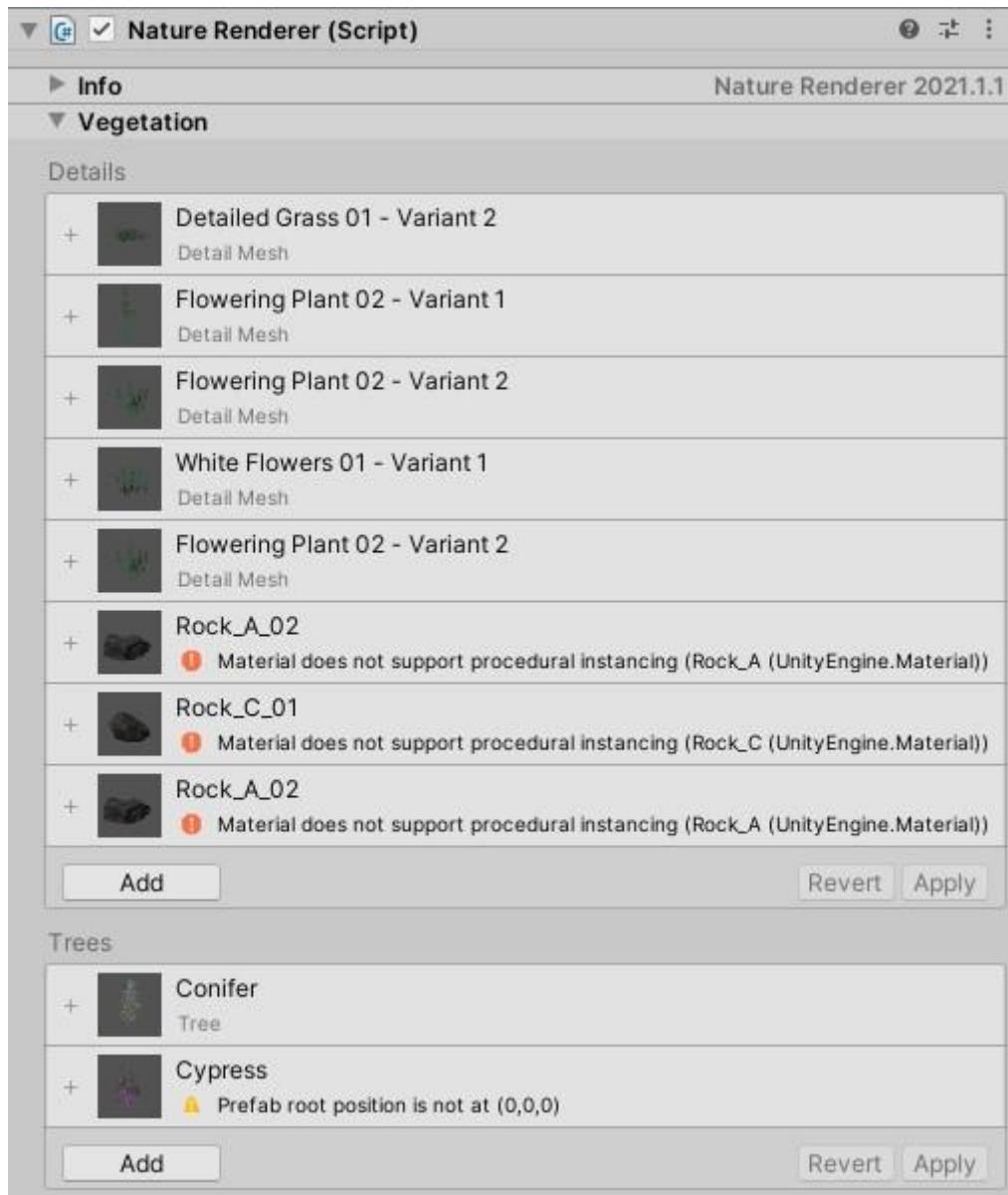
Nature Renderer is enabled by adding the Nature Renderer component to your terrain(s).

1. Select the terrain Game Object in your scene.
2. Click Add Component at the bottom of the inspector.
3. Type "Nature Renderer" to find the Nature Renderer component and click to add it to the terrain.
4. Nature Renderer will automatically set up after the component has been added to the terrain.



## Step 2: Register vegetation

Vegetation is automatically loaded from the terrain and is visible in the Vegetation section of the Nature Renderer component. New trees and detail objects can be added via this list in the Vegetation section.



It is recommended to add objects via the vegetation list and not directly in the Terrain component because Unity does not allow adding objects with LOD Groups.

Some vegetation objects may not be supported by default because they are using 2D grass textures or unsupported shaders. For these objects, an error message will be displayed in the vegetation list.

## Grass Textures

Nature Renderer requires detail objects to use prefabs and it is not possible to directly use 2D grass textures. This is because render settings are loaded from the Mesh Renderer and Nature Renderer Object Settings components in the prefab and grass textures can't have components.

You can automatically create a new prefab and material for grass textures or assign an existing prefab.

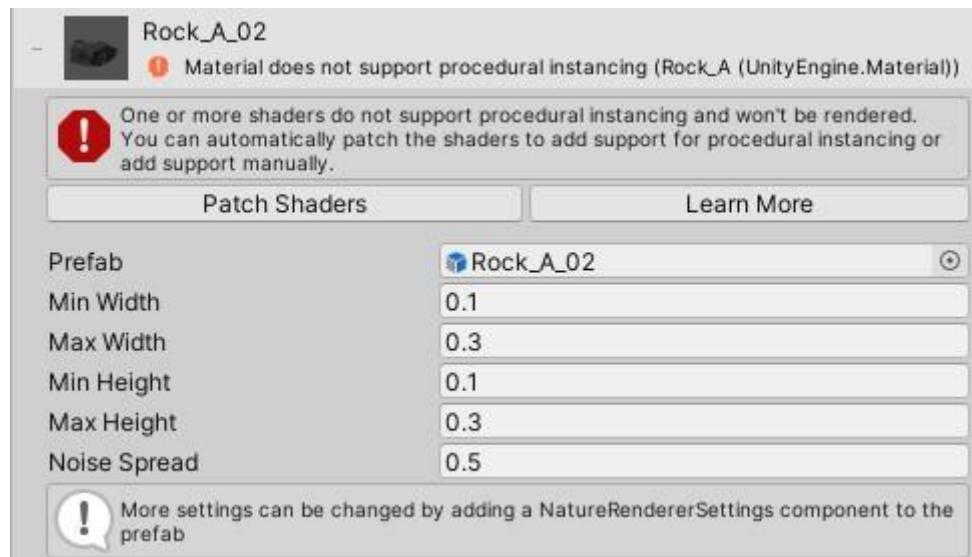


*Error message for grass textures*

## Shaders

Custom shaders need to be modified to support Nature Renderer's GPU-based render pipeline and Procedural Instancing. An automatic shader patcher is included to modify the shaders for you.

Select an object in the vegetation list and click "Patch Shaders" to automatically modify the shaders and materials to add support for Nature Renderer.



*Error message for a detail object using an unsupported shader*

Alternatively, you can change your shaders to the included Nature Shaders Essentials. They fully support Nature Renderer and also include additional features such as wind and improved lighting for vegetation.

## Step 3: Tweak Settings

Nature Renderer is now set up and you should see your vegetation rendered on the terrain. If the terrain does not yet have any existing vegetation then you can place/paint vegetation on the terrain using Unity's default terrain tools.



*Final result after setting up Nature Renderer*

You can continue by setting up or tweaking the following features, or learn more about the core concepts in Nature Renderer:

### Wind

If your vegetation uses the included Nature Shaders Essentials then you can set up wind animations by following the [Wind](#) guide.

### Render Settings

Additional render settings such as render distance, shadow distance, and density are set in the Nature Renderer Object Settings component. If no component is added to the prefab then the default (optimized) settings are used.