Gaussian Blur Shader

v 1.3 - Flying Banana

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1.   Thank you!

Thank you for buying Gaussian Blur Shader! Or if you have obtained this asset by some other means, please support me by purchase it on the Asset Store if you think it's useful!

If you have any questions, suggestions, comments or feature requests, please email me at jiacong.xu@foxmail.com!

2.   Design

Gaussian blur shaders are designed to mimic the blur effect prominent from iOS 7. It is written with speed, final result and usability in mind. There are two shaders included in this asset - a 10-pass shader that gives reasonable result, and a 14-pass shader HQ version that gives a better quality result, especially noticeable with higher strength.

Both shaders are quite expensive to use, although optimisations such as axial separation are implemented. It is an expensive effect on the phone and should be used sparingly.

3.   Usage and Tips

The quickest way to get started is to look at the example project. Simply create a material with the provided shaders, and attach material to any object (3D object or UI, both works).

Keep in mind that the blur is taxing to the system! Use sparingly to achieve good effect, both design-wise and performance-wise.

The cheap blur breaks down around the vertical edges, which may or may not be noticeable depending on blur strength and image underneath it, while the HQ version fixes this problem. However, since both shaders are approximations, at some strength the shader will break down, so adjust the strength parameter with this in mind!

The vibrancy option can be used to boost lighting if the blurred area is too dark. You can also use this to achieve a fancy fade in effect.

To show a non-rectangular section of the blur, assign a texture with alpha for the blur material. If used in UnityUI, assign the image for the Image component instead of the material.

When the objects with blur are viewed from the same camera (e.g. all in UI), you can uncomment the "_GrabTexture" option in the shader. Alternatively, for each group of objects viewed from the same angle, you can copy and paste the shader and change "_GrabTexture" to a different name for each group. This provides about a 20% speed boost for multiple blurred objects in the scene.

4. Inquiries, suggestions and comments

Please email me at jiacong.xu@foxmail.com! I hope this asset will be helpful for your need!