CHROMA KEY KIT MANUAL

ChromaKeyKit delivers a background removal feature with a wide range of chroma key color options. Kit components allows to apply additional shaders to established in material. Also using tools of chroma, blur and mask you will be able to make sequence of shaders, each of which is applied to result of previous. It enables you to achieve the best results.

KIT CONTROLLER

Kit controller - consistently applies shaders of KitComponents to source material.

KitControllerRenderer

Use ***"KitControllerRenderer"*** if your GameObject uses MeshRenderer.

KitControllerRenderer

Use ***" KitControllerRawImage "*** if your GameObject uses RawImage.

CHROMA KEY COMPONENTS

Kit component - sets values to it's shader properties.

ChromaKey_Alpha_Simple (KitComponent)

KeyColor - Color that will be transparent on the result;

DChroma - Chroma differense in Color between Key and Source;

DChromaT - Chroma tolerance;

ChromaKeyShader - Set ChromaKeyKit/ChromaKey_Alpha_Simple (MultiShaderKit/ChromaKeyKit/KitComponents/ChromaKey/ChromaKey_Alpha_Simple.shader);

ChromaKey_Alpha_General (KitComponent)

KeyColor - Color that will be transparent on the result;

DChroma - Chroma differense in Color between Key and Source;

DChromaT - Chroma tolerance;

DLuma - Luma differense in Color between Key and Source;

DLumaT - Luma tolerance;

ChromaKeyShader - Set ChromaKeyKit/ChromaKey_Alpha_General (MultiShaderKit/ChromaKeyKit/KitComponents/ChromaKey/ChromaKey_Alpha_General.shader);

ChromaKey_BgColor (KitComponent)

BgColor - Color that will be placed instead of KeyColor;

KeyColor - Color that will be BgColor on the result;

DChroma - Chroma difference in Color between Key and Source;

DChromaT - Chroma tolerance;

Chroma - Result chroma of color: closer to Source(0) -> closer to Bg(1);

Luma - Result luma of color: closer to Source(0) -> closer to Bg(1);

Saturation - Result saturation of color: closer to 0(0) -> closer to result chroma(1);

Alpha - Result alpha of BgColor;

ChromaKeyShader - Set ChromaKeyKit/ChromaKey_BgColor (MultiShaderKit/ChromaKeyKit/KitComponents/ChromaKey/ChromaKey_BgColor.shader);

ChromaKey_BgTextureColor (KitComponent)

BgTex - Texture that will be placed instead of KeyColor;

KeyColor - Color that will be BgTex on the result;

DChroma - Chroma difference in Color between Key and Source;

DChromaT - Chroma tolerance;

Chroma - Result chroma of color: closer to Source(0) -> closer to Bg(1);

Luma - Result luma of color: closer to Source(0) -> closer to Bg(1);

Saturation - Result saturation of color: closer to 0(0) -> closer to result chroma(1);

Alpha - Result alpha of BgTexture;

ChromaKeyShader - Set ChromaKeyKit/ChromaKey_BgTex (MultiShaderKit/ChromaKeyKit/KitComponents/ChromaKey/ChromaKey_BgTex.shader);

BLUR COMPONENTS

Blur_Simple (KitComponent)

BlurXY - The spread by X and Y (X = Y) used when filtering the image;

BlurShader - Set one of the shaders in this section ChromaKeyKit/Blur (MultiShaderKit/ChromaKeyKit/KitComponents/Blur/...);

Blur_General (KitComponent)

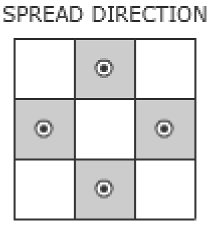
BlurX - The spread by X used when filtering the image;

BlurY - The spread by Y used when filtering the image;

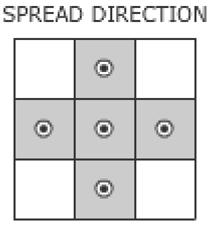
BlurIterations - The number of times the filter operations will be repeated (Low value = faster);

BlurShader - Set one of the shaders in this section ChromaKeyKit/Blur (MultiShaderKit/ChromaKeyKit/KitComponents/Blur/...);

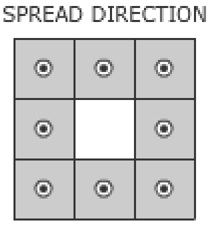
Blur shaders



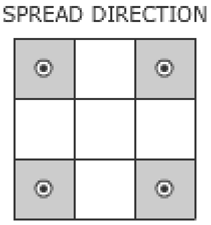
Blur_010-101-010.shader



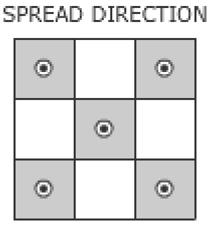
Blur_010-111-010.shader



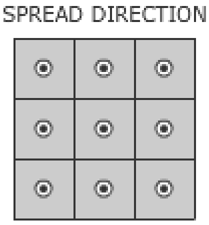
Blur_111-101-111.shader



Blur_101-000-101.shader



Blur_101-010-101.shader



Blur_111-111-111.shader

MASK COMPONENTS

MaskAlpha_Simple (KitComponent)

MaskShader - Set ChromaKeyKit/Mask/MaskAlpha_Simple (MultiShaderKit/ChromaKeyKit/
KitComponents/Mask/MaskAlpha_Simple.shader);

Mask Alpha_General (KitComponent)

AlphaPow - Pow of alpha value;

MaskShader - Set ChromaKeyKit/Mask/MaskAlpha_Simple (MultiShaderKit/ChromaKeyKit/
KitComponents/Mask/MaskAlpha_General.shader);

MaskAlpha_Expert (KitComponent)

AlphaEdge - Alpha gradient edge;

AlphaPow - Alpha power;

MaskShader - Set ChromaKeyKit/Mask/MaskAlpha_Simple (MultiShaderKit/ChromaKeyKit/
KitComponents/Mask/MaskAlpha_Expert.shader);

FILTER COMPONENTS

FilterHSBC (KitComponent)

BaseColor - Color tint;

Hue - Color hue(0 -> 360);

Saturation - Color saturation;

Brightness - Color brightness;

Contrast - Color contrast;

FilterShader - Set ChromaKeyKit/Filter/FilterHSBC (MultiShaderKit/ChromaKeyKit/
KitComponents/Filter/FilterHSBC.shader);

USEAGE

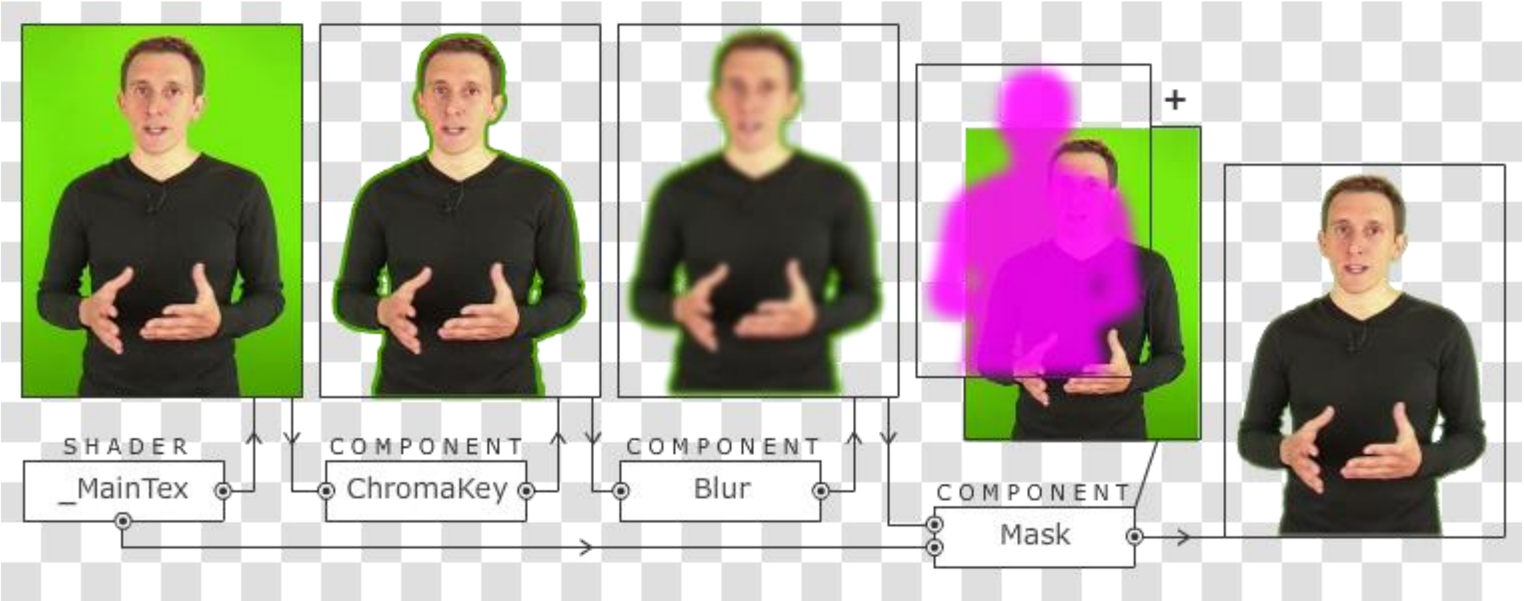
KEY COLOR → ALPHA

Shader only

The fastest way is to use one of ***ChromaKey_Alpha_*** shaders (***"ChromaKey_Alpha_Simple"***, ***"ChromaKey_Alpha_General"***) to material. It will behave like unlit with chromaKey properties.

Best quality

Use a sequence of components:

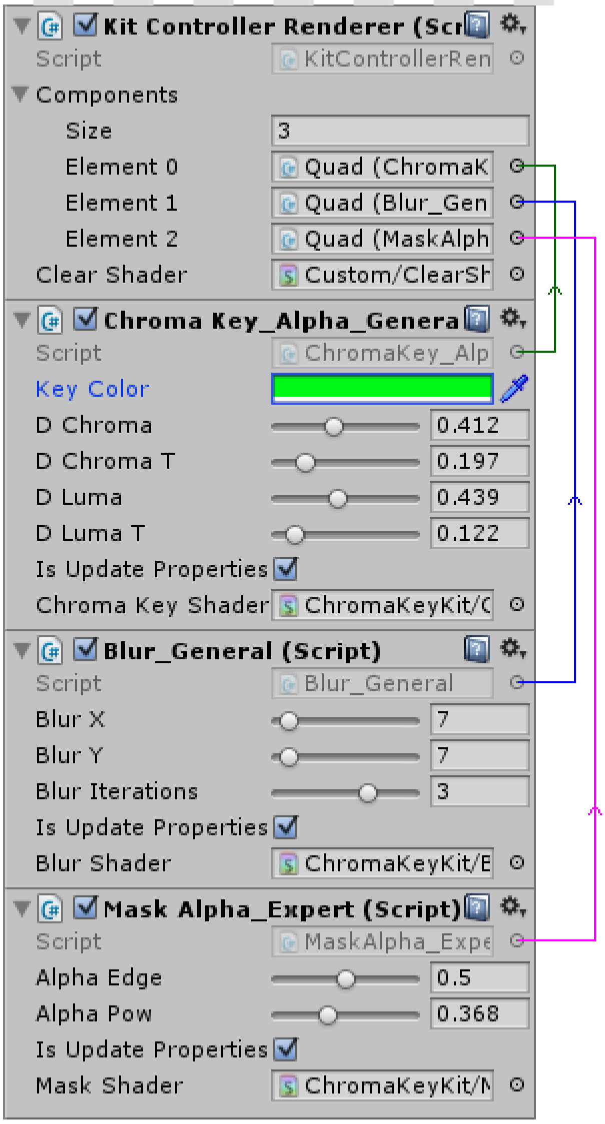


– add to your GameObject KitController (***"KitControllerRenderer"*** for MeshRenderer or ***"KitControllerRawImage"*** for RawImage), set ClearShader, set ComponentsSize to 3;

– add to your GameObject ***ChromaKey_Alpha_*** component (***"ChromaKey_Alpha_Simple"*** or ***"ChromaKey_Alpha_General"***), set corresponding shader, put it in KitController in components at 1st position;

– add to your GameObject ***Blur_*** component (***"Blur_Simple"*** or ***"Blur_General"***), set corresponding shader, put it in KitController in components at 2nd position;

– add to your GameObject ***MaskAlpha_*** component (***"MaskAlpha_Simple"*** or ***"MaskAlpha_General"*** or ***"MaskAlpha_Expert"***), set corresponding shader, put it in KitController in components at 3d position;



☑ Kit Controller Renderer (Scr

Script: KitControllerRen

Components

Size: 3

Element 0: Quad (ChromaK

Element 1: Quad (Blur_Gen

Element 2: Quad (MaskAlph

Clear Shader: Custom/ClearSh

☑ Chroma Key_Alpha_Genera

Script: ChromaKey_Alp

Key Color: 🟩

D Chroma: 0.412

D Chroma T: 0.197

D Luma: 0.439

D Luma T: 0.122

Is Update Properties: ☑

Chroma Key Shader: ChromaKeyKit/C

☑ Blur_General (Script)

Script: Blur_General

Blur X: 7

Blur Y: 7

Blur Iterations: 3

Is Update Properties: ☑

Blur Shader: ChromaKeyKit/E

☑ Mask Alpha_Expert (Script)

Script: MaskAlpha_Expe

Alpha Edge: 0.5

Alpha Pow: 0.368

Is Update Properties: ☑

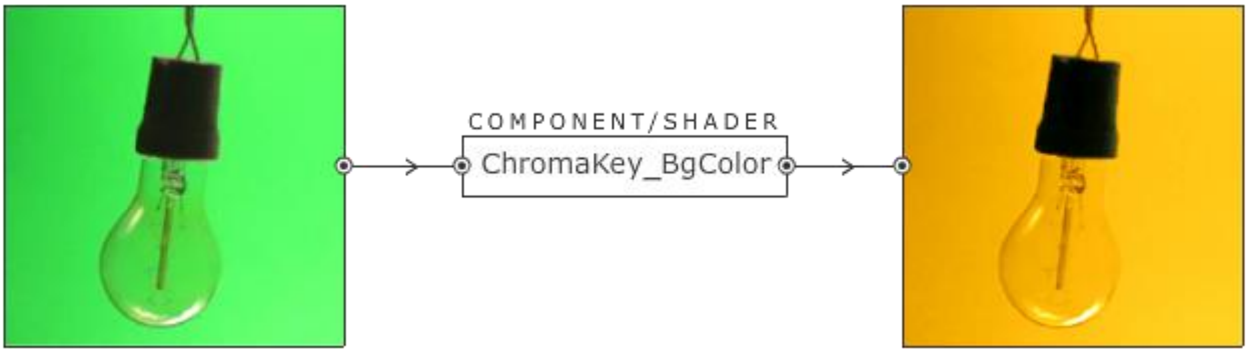
Mask Shader: ChromaKeyKit/M

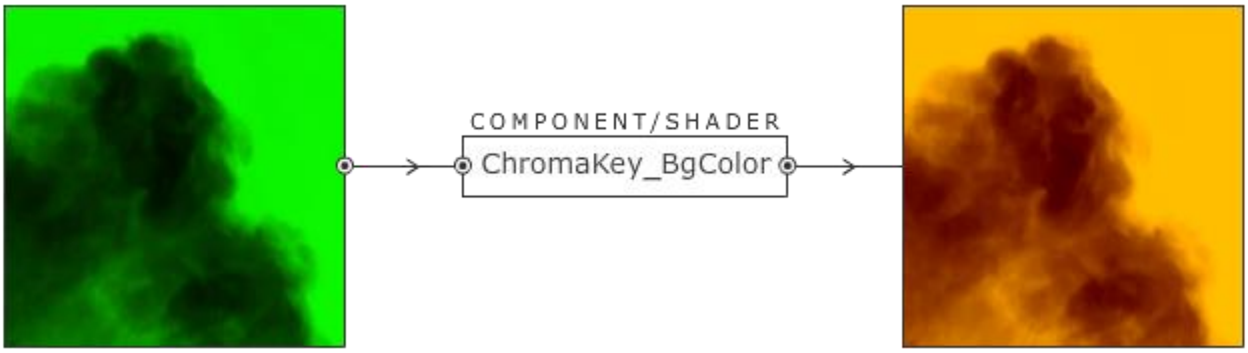
You can also use prefabs ***"Renderer_ChromaKey-Blur-Mask"*** or ***"RawImage_ChromaKey-Blur-Mask"***. In this case, you can select any shader to the used material.

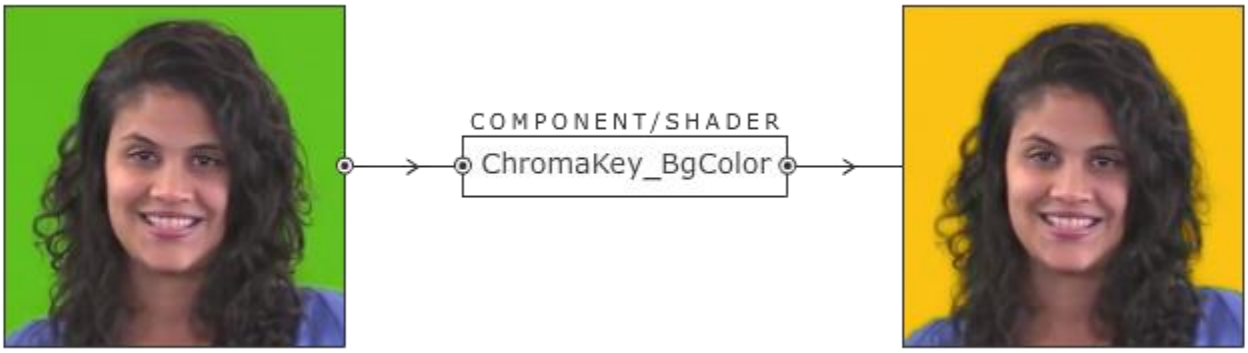
KEY COLOR → BACKGROUND

In difference from ChromaKey_Alpha, background components changes key color to background color. It well is suitable for images in which there are transparent objects, fine details, etc.:

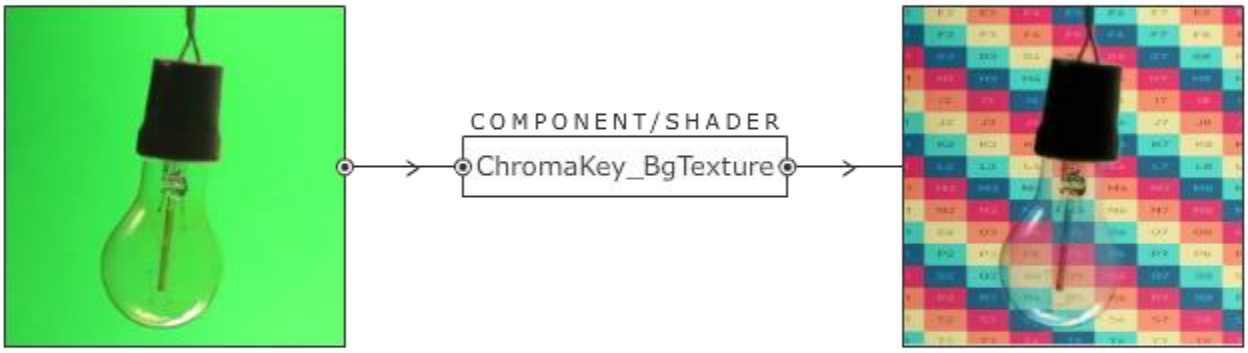
Background Color

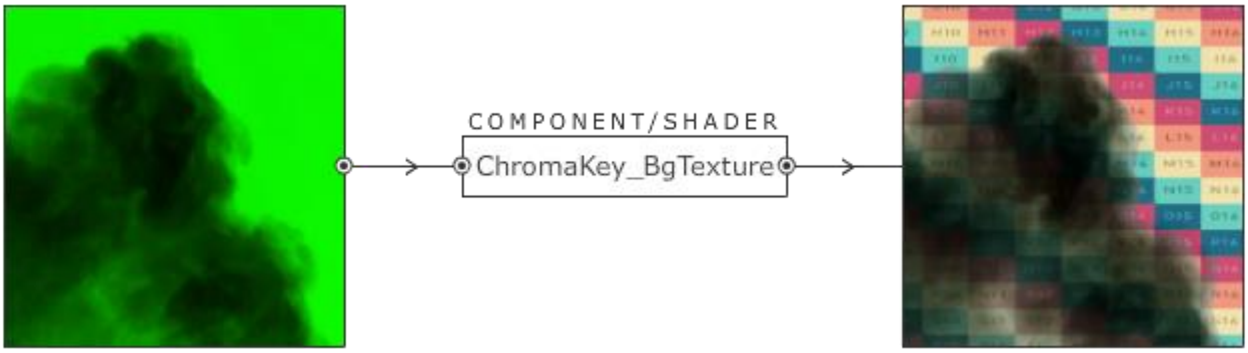


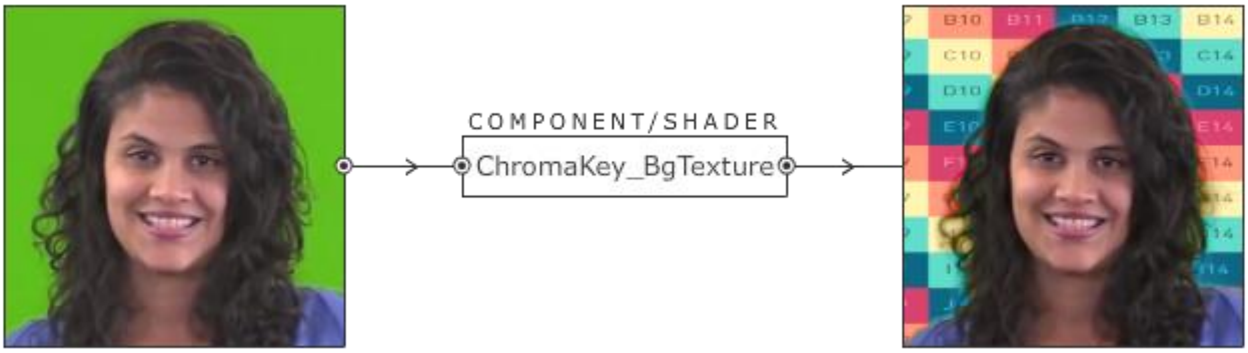




Background Texture





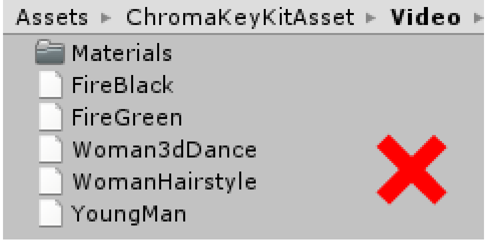


Use the corresponding shaders or binding KitController + ***ChromaKey_Bg_*** component (***"ChromaKey_BgColor"*** or ***"ChromaKey_BgTexture"***).

NOTE

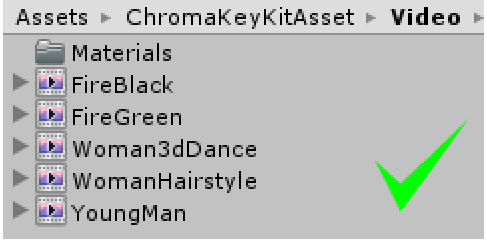
After import

Make sure that Unity Editor has updated video files(*Assets\ChromaKeyKitAsset\Video*):



Assets ▸ ChromaKeyKitAsset ▸ **Video** ▸

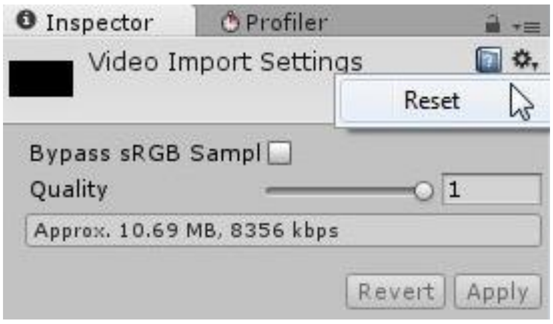
- Materials
- FireBlack
- FireGreen
- Woman3dDance
- WomanHairstyle
- YoungMan



Assets ▸ ChromaKeyKitAsset ▸ **Video** ▸

- Materials
- ▶ FireBlack
- ▶ FireGreen
- ▶ Woman3dDance
- ▶ WomanHairstyle
- ▶ YoungMan

Try to reset all this files:



Video Import Settings

Bypass sRGB Sampl □

Quality 1

Approx. 10.69 MB, 8356 kbps

SUPPORT

Contact

If you have any comments, questions, or issues, please email me at **nexweron@gmail.com**.