

ultimatte[®]
for Avid AVX

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for Avid AVX

ultimatte

getting started

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about this user guide

This manual is designed for use in conjunction with the included *Ultimatte Overview Manual* that provides more complete information about how **Ultimatte** works and how to achieve the best results. Also, this manual assumes that you are with your **Avid** system and understand its basic operation. **Avid** systems often provide a variety of ways to carry out a particular operation. In this guide, we will show you one way to load and use the Ultimatte plug-ins in the **Avid** environment, but other ways to carry out various operations are also available. Please refer to the **Avid** documentation for general operational information.

Throughout this document, references to blue screening, blue backing areas, etc. would apply to green when green is used as a backing color.

We suggest that you read through this manual (it's short!) and follow along tutorial-style to get up to speed on **Ultimatte** as quickly as possible.

How to Contact Us

In addition to reading the *Ultimatte Overview Manual*, you can learn more about blue-screen compositing techniques and the latest news on our **Avid** plug-ins by visiting the **Ultimatte** web site at **www.ultimatte.com**

Technical support is available from 8:00 AM to 4:30 PM Pacific time at (818) 993-8007 or you can send e-mail to **support@ultimatte.com**

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ultimatte for Avid AVX

Ultimatte bluescreen image compositing and matting software for **Avid AVX** produces seamless composited images using the same patented algorithms as in **Ultimatte's** Oscar and Emmy-award winning systems. With **Ultimatte**, you can create flawless composites of the highest quality, retaining all details, shadows and transparencies.

Ultimatte is NOT a simplistic chroma-keyer, but the same full-fledged, professional quality blue and green screen system used in major motion pictures, on television and in multimedia productions of the highest caliber. Fine hair detail, water, shadows, smoke, glass and reflections, even blurred edges are all composited flawlessly and automatically. With **Ultimatte**, you achieve totally realistic-looking composited scenes that would otherwise be too dangerous, impossible or impractical.

Ultimatte provides three AVX plug-ins for **Avid Systems: Screen Correction, Grain Killer** and **Ultimatte**.

minimum system requirements

Ultimatte will run on any **Avid** system which supports the Avid AVX plug-in specification.

installation and security key

The security key must be connected in order for the software to run. If the key is not connected, the **Ultimatte** software will run in demo mode and render a grid over its output.

Macintosh:

Make sure your computer is shut down, then install the **Ultimatte** security key on the Apple Desktop Bus (ADB) and re-boot your computer. To install the three **Ultimatte** plug-ins, open the **Avid** folder on the **Ultimatte** disk, and drag the three **Ultimatte** plug-in icons (**Screen Correction, Grain Killer** and **Ultimatte**) into the "AVX_Plug-Ins" folder on your Avid system.

Windows:

Make sure your computer is shut down, then install the **Ultimatte** security key on your computer's parallel port and then re-boot your computer. To install the three **Ultimatte** plug-ins, use the "Install Plug-ins" option on the disk or drag the three **Ultimatte** plug-in icons (**Screen Correction, Grain Killer** and **Ultimatte**) into the "AVX_Plug-Ins" folder on your Avid system.

Macintosh and Windows:

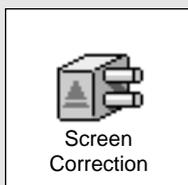
You will need three images from the **Ultimatte** disk in order to follow this tutorial. To install them on your hard drive, open the **Ultimatte Images** folder and copy the Targa format screen correction, foreground and background images (**SC.TGA, FG.TGA** and **BG.TGA**) to a directory of your choosing on your media hard drive.

getting started

getting started

ultimatte for AVID AVX

Ultimatte for Avid AVX consists of three plug-ins which are designed to work together to create flawless composites:



Screen Correction

compensates for anomalies in the blue screen; uneven lighting, smudges, seams, or blue set pieces. Using an exact copy of the problematic blue screen with the subject matter removed, this effect will rid the foreground of these unwanted anomalies, creating a new image against a perfect blue backing.



Grain Killer

reduces noise in the screen area of the foreground often created by film grain, video noise, or compression.



Ultimatte

creates the matte and seamlessly composites foreground elements into a background scene retaining all detail. If the camera can see it, **Ultimatte** can composite it.

To obtain the best results, use the plug-ins in the following order: Screen Correction, Grain Killer, Ultimatte.

getting started **terminology**

Background

The image that will replace the backing color of the foreground in the final composite. Also noted as BG.

Backing

The blue or green screen area.

Composite

The foreground image (with the backing area and flare removed) combined with the background clip.

Flare

Contamination of the blue (green) screen on to the foreground subject. Also referred to as spill.

Foreground

The subject matter against the backing color. Also noted as FG.

Grain Killer

This plug-in reduces noise in the screen area of the foreground often created by film grain, video noise, or compression.

Matte

A black, gray and white image that is used to determine the percentage of foreground and background values. Also referred to as alpha channel.

Print-thru

When areas of the background are visible through the foreground subject where they should not be seen, or when the foreground is not opaque in areas that should be opaque.

Processed Foreground

The foreground image with the backing area suppressed to black and all flare removed.

Screen Correction

This plug-in compensates for anomalies in the blue screen; uneven lighting, smudges, seams, or blue set pieces. Using an exact copy of the problematic blue screen element with the subject matter removed, this effect will rid the foreground of these unwanted anomalies, giving the impression of being shot against a perfect blue field.

Screen Correction Scene

An identical copy of the original foreground with no props or talent.

Veiling

A colorized haze over the background.

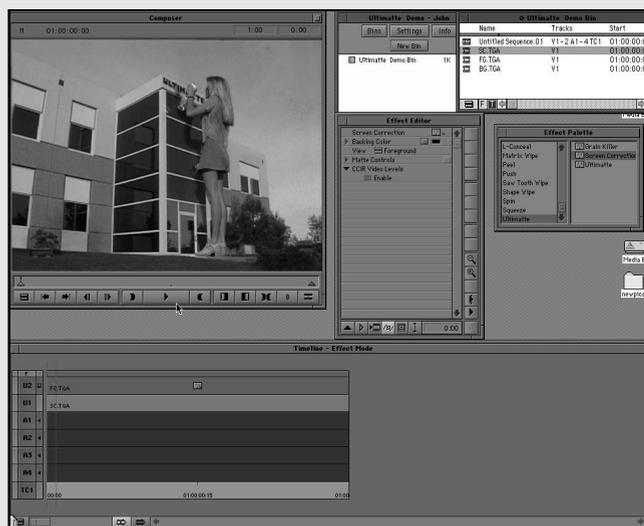
Ultimatte

The best way to seamlessly composite foreground elements into a background scene retaining all detail. If the camera can see it, Ultimatte can composite it.

For more complete discussions of these, please see the Ultimatte Overview Manual.

getting started

Ultimate Tutorial



A completed *Ultimate* set-up in
Avid Xpress

Load the Avid System and begin a New Project

After you have installed the *Ultimate* plug-ins, begin by starting your *Avid* system. Follow the usual start-up procedures and select or create a user. For this tutorial, select a *New Project*. Title it "Ultimate Demo".

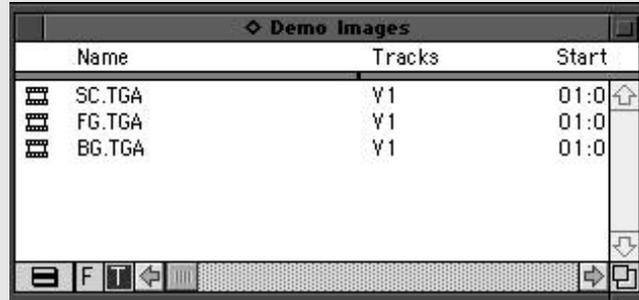
Importing Files: An Important Note about File Formats

When importing files into the *Avid* system, make sure that you use the *Import Options* selection to tell the *Avid* system whether or not the files being imported are CCIR compliant. It is not a good idea to mix CCIR and non-CCIR images and clips. If you do import images in mixed modes, such as an RGB file as an *Ultimate* background and CCIR compliant foreground footage, make sure that you use the *Avid Color Effect* to equalize the color levels in the images/clips. The *Ultimate* plug-ins allow you to either enable or disable CCIR compliance via a button in the *Effects Editor* window. If CCIR is enabled (the default), all clips must meet the CCIR standard or the color output levels will be clipped. Make sure that you disable CCIR if you are using RGB graphic file types, such as those used in this tutorial.

Import the Ultimatte Sample Images

Highlight the *Ultimatte Demo* project window and create a new bin using the *New Bin* button.

- Title the bin "Demo Images." A new window will appear called "Demo Images Bin". Click in the *Demo Images Bin* to make it active, then go to the *File* pull-down menu and select *Import*. A new window will appear asking for the files you would like to import.



- Locate the folder where you copied the images on your hard drive. Make sure that the file type is set to *Graphic/Audio* or *Graphic* in the *Import* window. Since we want to create a new alpha channel for the Ultimatte composite, click on the *Options* button in the *Import* window and check the box marked "Ignore Existing Alpha." Our tutorial uses single frames instead of longer clips so also use the *Import Options* menu to set the duration of the imported images to one second.
- Highlight **SC.TGA** (the Screen Correction frame) and click **ADD (Open)**, then **FG.TGA** (the Foreground image) and click **ADD (Open)**, then **BG.TGA** (the Background frame) and click **ADD (Open)**. Finally, click *Done* and you will see all three of the imported images in the *Demo Images Bin*.

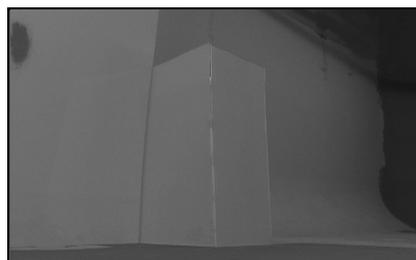
screen correction corrects uneven lighting, smudges & set pieces

**For best results use Screen Correction, then
Grain Killer followed by Ultimatte.**

Screen Correction compensates for anomalies in the backing area such as uneven lighting, smudges, seams, variations in the backing color, blue set pieces, and unwanted shadows cast by set pieces. By using as a reference an exact copy of the problematic blue screen element with the foreground subject matter omitted, *Ultimatte's* algorithms will automatically correct the foreground so that the levels of the blue (green) screen are the same throughout each frame. *Screen Correction* differentiates between foreground elements and backing flaws, thereby allowing the *Ultimatte* algorithms to retain all foreground detail without compromise because of a poorly shot foreground element. For more detailed information, see the *Screen Correction* section in the *Ultimatte Overview Manual*.



+



screen correction

screen correction

the process

Load the Foreground Image

- Click and hold the icon for the foreground image (**FG.TGA**) in the Demo Images Bin and drag it down into the *Timeline* window. It will appear in Video Track One (**V1**).
- Click on the yellow segment mode "Splice-in" button at the bottom of the timeline. Then drag the foreground shot (**FG.TGA**) from **V1** to Video Track Two (**V2**).



- Click on the foreground (**FG.TGA**) now located in **V2** on the timeline. To the left of the **V2** track there is a *Video Monitor* indicator that identifies which track you are seeing in the *Composer* window. Make sure the *Video Monitor* is displaying **V2**. The *Composer* window now displays the image of the woman in front of the blue-screen.

Load the Background frame into Video Track One (V1)

- From the *Demo Images Bin*, drag the **BG.TGA** (Background) frame to **V1**. This is the *Background* frame that will be composited behind the foreground.

We're now ready to go into *Effect Mode* and use the *Screen Correction* controls to create a perfect bluescreen.

Open the Effect Palette and the Effect Editor

- Use the Tools pull-down menu to select the *Effect Palette* and the *Effect Editor*.
- Highlight the *Effect Palette* and select *Ultimate* from the alphabetical list. Once *Ultimate* is selected in the list of effects, the *Screen Correction*, *Grain Killer* and *Ultimate* plug-ins will appear in a new list on the right.

Load the Screen Correction plug-in into Video Track Two (V2)

- While holding down the Option (ALT) key, click on the *Screen Correction* "electric plug" icon and drag it to the foreground in **V2**. Notice that **V2** now contains the *Screen Correction* plug-in icon and that the Timeline is now in "Effect Mode". Double-click on the Foreground (**V2**) track to open up a "nest" for the *Screen Correction* effect.



Load the Screen Correction frame into the nest on Track 1.1

- Click on Track 1.2 in the Timeline to temporarily leave Effect Mode
- Drag the *Screen Correction* frame (**SC.TGA**) from the Demo Images Bin into Track 1.1.
- Click again on Track V2 to re-enter effect mode. Then double-click on the *Screen Correction* plug-in in the Effect palette which will bring up the *Screen Correction* controls in the *Effect Editor* window
- Since we are using RGB graphic images for this tutorial, use the CCIR twirl-down arrow and then the checkbox to disable CCIR video.

Sample the Backing Color

- Place the cursor directly over the small, black swatch in the *Effect Editor* window. The cursor will become an Eyedropper. Now we need to sample the backing color in order to provide the *Screen Correction* plug-in with a value for blue that it will use to work its magic.

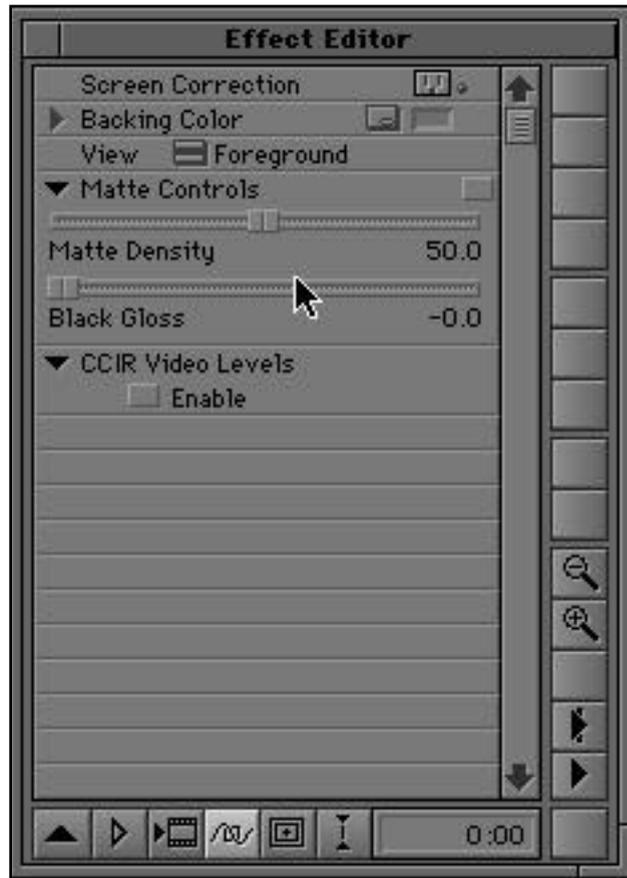


- Click, hold and drag the Eyedropper over to the *Composer* window. Locate an area on the screen that contains a well-lit blue that is close to, but not obscured by, an area of fine detail. Release the mouse button and notice that the swatch in the *Effect Editor* window is now the same blue that you picked from the blue screen.

- In the *Screen Correction* controls, place the cursor over the square button just to the right of the word *View*. It becomes a downward pointing arrow and by default it reads *Foreground*. Click and drag down to *Corrected Foreground*. When the *Corrected Foreground* is displayed in the *Composer* window, it should look like a perfectly lit blue-screen.

Using the Screen Correction Matte Controls

The controls in this menu are used to isolate the foreground image from the backing. When using *Screen Correction* the matte should have perfect density or be slightly over-dense, but never under-dense. If an object that should have an opaque matte has a semi-transparent matte, *Screen Correction*



will try to partially correct that object, thereby making it closer to the actual backing color. This will cause more print-thru problems when the *Ultimatte* plug-in is used.

You can use the *Matte Density* control to stop print-thru in bright foreground objects or the *Black Gloss* control to prevent print-thru in black glossy or dark foreground objects.

- Set the *View* to "Matte" in the *Screen Correction Effect Editor* window and decide if there are any areas that appear gray (transparent) in your foreground subject matte that should be white (opaque).
- Adjust the *Matte Density* and/or *Black Gloss* values slightly by using the slider.

Switch the View to "Corrected Foreground"

- Set your view back to "Corrected Foreground" to view the results.

You've finished with *Screen Correction*! If you want to learn more about how it works, please read the appropriate section of the informative "Ultimatte Overview Manual."

Screen Correction Summary

- **Load the Foreground Image into Video Track Two (V2)**
- **Load the Background Image into Video Track One (V1)**
 - **Open the Effect Palette and the Effect Editor**
- **Nest the Screen Correction plug-in onto Video Track Two (V2)**
 - **Load the Screen Correction Image into Track 1.1**
 - **Sample the Backing Color**
 - **Adjust the Matte Controls if necessary**
 - **Switch the View to "Corrected Foreground"**

grain killer **to clean up grainy & noisy backing**

If you are using Screen Correction, use it before you use Grain Killer

Grain Killer is an exclusive *Ultimate* feature which removes film grain or video noise from only the blue screen area. *Ultimate* is so good at compositing fine detail that any noise in the backing will be composited onto the background, adding to noise which resides in the background scene. This is often very subtle and unnoticeable. However, if you want a perfectly clean composite, especially where the noise problem is compounded by multi-layer composites, *Grain Killer* will remove the noise from the background without softening the foreground subject. For a more complete discussion of *Grain Killer*, please see the *Ultimate Overview Manual*.

Remember that if you are using *Screen Correction*, use it before you use *Grain Killer*.



Before Grain Killer



After Grain Killer

grain killer

the process

- Make sure that *Ultimatte* is still highlighted in the *Effect Palette* and that the *Grain Killer*, *Screen Correction* and *Ultimatte* plug-ins are visible in the effects list to its right.

Load the Grain Killer plug-in onto the V2 track

- Since we want to nest two effects on the same clip, hold down the Option (ALT) key as you drag the *Grain Killer* effect onto the clip on **V2**. The *Grain Killer* effect is now nested on the *Screen Corrected* foreground.



- Highlight the *Effect Editor* window (which now contains the *Grain Killer* controls) and make sure that the *View* is set to *Foreground*.

- Since we are using RGB graphic images for this tutorial, use the CCIR twirl-down arrow and then the checkbox to disable CCIR video.

Sample the backing color

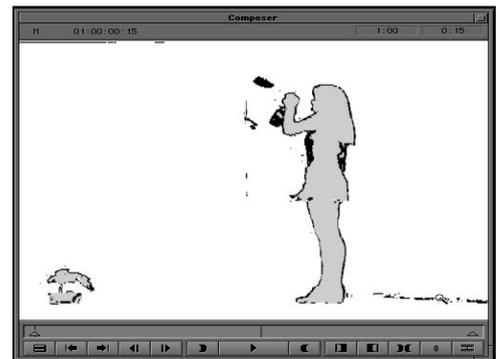
- As you did in the *Screen Correction* process, place the cursor directly over the black swatch in the *Effect Editor* window. The cursor will become an Eyedropper.

- Sample the backing color in order to provide the *Grain Killer* plug-in with a value for blue. Click, hold and drag the Eyedropper over to the *Composer* window. Locate an area on the screen that contains a well-lit blue. Release the mouse button and the swatch in the *Effect Editor* window displays the blue that you just picked.

Display the Filter Area

- In the *Grain Killer* controls, place the cursor over the button just to the right of the word *View*. It becomes a downward pointing arrow. By default it reads *Foreground*. Click and drag it down to *Filter Area*.

The displayed view is a representation of the image where green defines the foreground subject, white areas define the backing area (the bluescreen) and the black areas represent transition areas. When using *Grain Killer*, the goal is to make the background areas of the image as white as possible without affecting the green foreground areas and with as little change as possible to the black areas.



Set the Screen Area Controls

- Click on the twirl-down arrow next to the words *Filter Control* and you will see the "Screen Area" slider that define the area to be filtered. These controls lets you adjust this value in order to provide *Grain Killer* with the offsets it needs to kill the grain.

- Try making fine adjustments until the backing area is mostly white without affecting the green foreground area. This control does not affect the amount of filtering that will occur but instead defines the areas to be filtered. Additional grain filtering can be carried out by "nesting" additional *Grain Killer* filters.

Adjust Matte Density and Black Gloss Controls if necessary

The *Matte Density* and *Black Gloss* controls are provided to let you make adjustments to eliminate any black areas which might appear within the green representation of the foreground object area. The boundaries of the green representation of the 100% foreground areas cannot be changed using the *Screen Area* slider, but can be modified by adjustments to the *Black Gloss* and *Matte Density* controls.

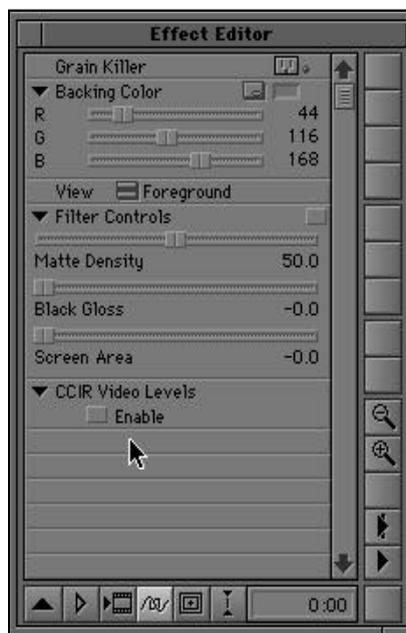
Display the Filtered Foreground

- Using the *Grain Killer* controls in the *Effect Editor* window, go to the *View* pull-down menu and select *Filtered Foreground*. Here you will see that the grain has been significantly reduced while the integrity of the foreground image has not been compromised. If your image still appears grainy, using additional *Grain Killer* passes will help.

Important Note:

When adjusting the *Grain Killer* filters, do not remove all of the black. Transparencies and fine edge detail are represented this way and if the filters are set too high, there will be no transition area and fine detail will be filtered.

For more information on *Grain Killer*, please see the appropriate section in the *Ultimate Overview Manual*.



Grain Killer Summary

- ***Nest the Grain Killer Plug-in onto the V2 Foreground track***
 - ***Sample the Backing Color***
 - ***Display the Filter Area***
 - ***Set the Screen Area Controls***
- ***Adjust Matte Density and Black Gloss Controls if necessary***
 - ***View the Filtered Foreground***

ultimatte compositing

If you're using Screen Correction or Grain Killer, use them before you composite with Ultimatte

Now that you've prepared your shots using *Screen Correction* and *Grain Killer*, you're ready to composite the elements together using *Ultimatte*. It will take the output from the *Screen Correction* and *Grain Killer* presets and combine the foreground and background images using a matte to create a new composited image. *Ultimatte* has the unique ability to composite anything that the camera can see, including but not limited to smoke, shadows, glass, reflections, fine detail and motion blur.



ultimatte

ultimatte

the process

Load the Ultimatte Plug-in onto the Foreground Track

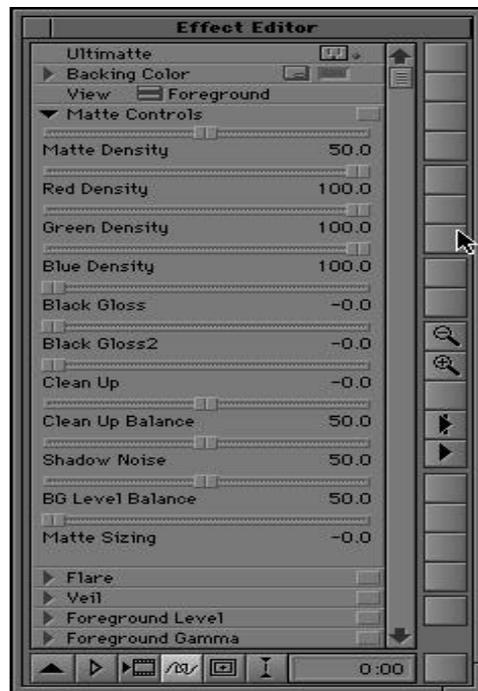
- Hold down the Option (ALT) key and drag the Ultimatte plug-in icon from the Effect Palette to the Foreground Track (V2). The Ultimatte effect is now nested onto the *Screen Corrected* and *Grain Killed* foreground.

- Now you will see the plug-in icon representing *Ultimatte* in the center of the clip on the V2 track. Click on it to activate the *Ultimatte* controls in the *Effect Editor* window. Then click in the *Effect Editor* and make sure that the view is set to *Foreground*.

- Since we are using RGB graphic images for this tutorial, use the CCIR twirl-down arrow and then the checkbox to disable CCIR video.

Select the Backing Color

- Sample the backing color in order to provide the *Ultimatte* plug-in with a blue value. Click, hold and drag the Eyedropper over to the *Composer* window. Locate an area on the screen that contains a well-lit blue, near, but not obscured by, important detail.



- Release the mouse button and the swatch in the *Effect Editor* will display the blue you picked.

View the Composite

- In the *Ultimatte* controls, use the *View* control and choose *Composite*. The Screen-corrected, Grain-killed composite will appear in the *Composer* window.

Set the Matte Controls

- Use the view drop-down menu to select "Matte." The matte will appear in the *Composer* window.

- Now click on the "Matte Controls" twirl-down arrow in the *Ultimatte Effect Editor* window.

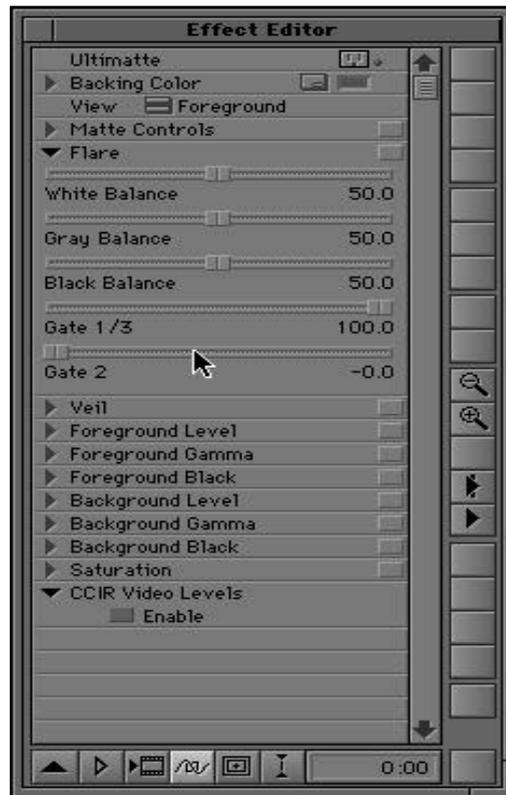
In the Matte View, the white areas represent opaque foreground subject matter, the black areas represent the backing areas which will be replaced by the new background image, and the gray areas represent partially transparent or transition areas. Reducing the density of the foreground object's matte can reduce dark matte lines in the composite.

Set the Flare Controls

Finally, click on the “Flare” tab to bring up *Ultimatte*’s flare controls and set the “View” to “Composite.” Often objects in the foreground shot will pick up some blue spill or flare. *Ultimatte*’s algorithms automatically suppress the flare, but if the flare on the subject is excessive, you can use these controls to compensate. You can correct excessive flare by adjusting the *Gray Balance* and *Black Balance* controls found on the Flare menu. When blue spill is a problem, try slightly higher settings for each of these and *Ultimatte* will remove the blue that has “spilled” onto the foreground subject.

Set the Color Controls

Often, the realism of a composited scene is compromised by mismatched colors (i.e., blacks in the foreground don’t match the blacks in the background.) *Ultimatte* provides RGB black, white and gamma controls for both the FG and BG images. Use these controls to match the colorimetry of the FG and BG to produce convincing composites.



This completes the tutorial section. The following pages describe each of the *Ultimatte* AVX plug-in controls. You can also find additional information about these and all of the other controls for the three *Ultimatte* plug-ins in the informative *Ultimatte Overview Manual*.

ultimatte controls

The first 6 Matte Controls are used for print-thru, dark edges and glowing edges.

Matte Density: Use this control to stop print-thru in bright foreground objects.

Warning: Advancing this control too far can cause hard, dark edges around foreground subjects.

Red Density: (not available for red backing): Use this control to reduce dark edges from reddish objects (flesh-tones).

Warning: Reducing this control too much can cause print-thru in reddish foreground objects.

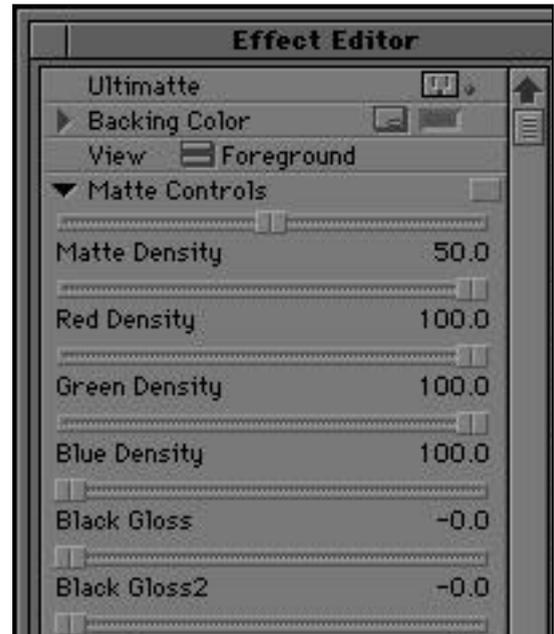
Green Density: (not available for green backing): Use this control to reduce dark edges from greenish objects (plants).

Warning: Reducing this control too much can cause print-thru in greenish foreground objects.

Blue Density: (not available for blue backing): Use this control to reduce dark edges from bluish objects. (blue jeans) **Warning:** Reducing this control too much can cause print-thru in bluish foreground objects.

Black Gloss: Use this control to stop print-thru in black glossy or dark foreground objects. **Warning:** Advancing this control too far can cause dark edges around the foreground subject and shadows will darken and become opaque.

Black Gloss 2: Use this control to stop print-thru on dark foreground objects that have an excessive amount of spill from the backing. This control adjusts the foreground prior to generating the matte, thereby giving the appearance of being both a matte control and a flare control. **Warning:** Advancing this control too far can alter the color of the foreground objects.



The next 5 Matte Controls are for hard edges, glowing edges and screen imperfections.

These matte controls are used to adjust the white and gray areas of the matte channel. This will dramatically affect the nature of foreground objects' edges, the opacity of transparent objects, and the noise in the background image. Use these controls sparingly as they WILL result in the loss of foreground detail. The proper technique for dealing with imperfections in the screen is through the use of *Screen Correction* and *Grain Killer*.



Clean Up: Used to reduce imperfections or small amounts of noise in the backing. **Warning: Advancing this control too far will result in a "cut and paste" look. Background noise will be reduced, but foreground detail will also be reduced.**

Clean Up Balance: Used only when the *Clean Up* control has been adjusted, this control determines how much influence the *Clean Up* control will have on the foreground and background images. If using the *Clean Up* control causes glowing or dark edges, *Clean Up Balance* can be used to reduce this problem.

Shadow Noise: Use this control to reduce noise in shadows and glare areas. **Warning: Decreasing the control too much will reduce fine detail.**

BG Level Balance: Use this control to override the automatic setting of the Background level as turned on by the matte, which is based on where the backing color was selected. Decreasing this control can enhance the appearance of fine foreground detail, but will darken the background image and increase "visual noise." Increasing this control can remove "visual noise" and brighten dark edges. **Warning: Advancing this control too far can cause foreground objects' edges to glow.**

Matte Sizing: Use this control to adjust the size of the matte channel, often referred to as "choking the matte." It can be used to reduce matte lines. **Warning: Advancing this control too far will result in a loss of detail.**

ultimatte controls

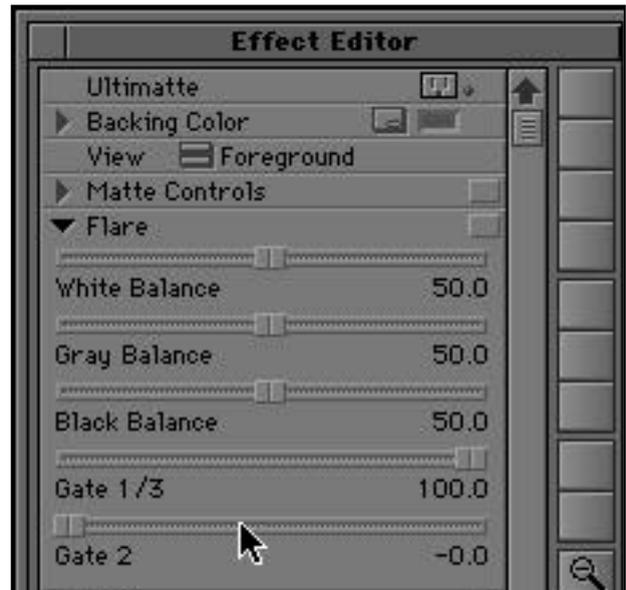
Flare Controls for excessive spill & miscolored subject matter

The *Ultimatte* algorithms will automatically suppress flare caused from the backing onto foreground subject matter. The flare controls are used to suppress excessive spill.

White Balance: Use this control to remove excessive spill on bright foreground objects.

Gray Balance: Use this control to remove excessive spill on midrange foreground objects.

Black Balance: Use this control to remove excessive spill on dark foreground objects.



Gate 1/3: ("Gate one three") Use this control to reproduce blues, greens, or cyans.

For blue screen: At 100%, blues will be reproduced. At 50%, blues will become cyan. At 0%, greens will be reproduced and blues/cyans will turn green.

For green screen: At 100%, greens will be reproduced. At 50%, greens will become cyan. At 0%, blues will be reproduced and greens/cyans will turn blue.

Gate 2: Use this control to reproduce the following colors:

For blue screen: used to reproduce pinks, purples, and magentas that will turn red when blue is subtracted. **Warning: Since skin tones are pinkish, advancing this control too far may add blue to the skin tones.**

For green screen: used to reproduce yellows and oranges that will turn red when green is subtracted. **Warning: Since skin tones are pinkish, advancing this control too far may add green to the skin tones.**

Veil Controls to correct a miscolored background or foreground edges

These controls are used to override the automatic suppression of the backing color. The *Ultimate* process uses the selected backing color to suppress the backing to black. An indication that the automatic settings did not suppress enough backing is "veiling" or a colorized haze over the background. An indication that the automatic settings suppressed too much backing is darkened or miscolored foreground edges and transparencies. In most cases these controls will be left at their default settings.



Master: This control overrides the automatic suppression of the red, green and blue channels simultaneously. Increasing this control will increase the brightness in the screen area. Decreasing this control will cause a darkening of the edges and transparencies.

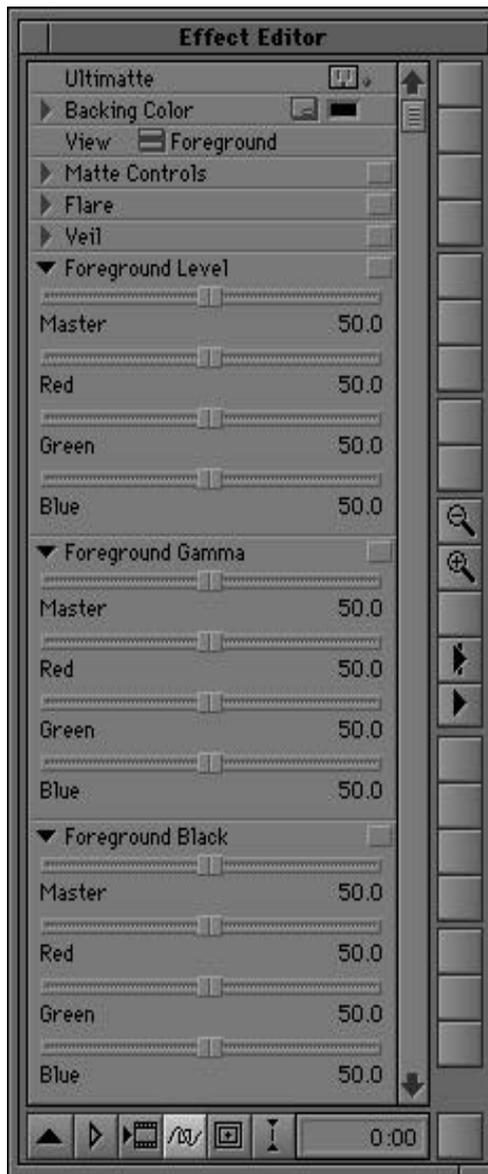
Red Veil: This control overrides the automatic suppression of the red channel. Increasing this control will increase the amount of red veiling (residue) left in the backing area. Decreasing this control will cause foreground edges and transparencies to become cyan.

Green Veil: This control overrides the automatic suppression of the green channel. Increasing this control will increase the amount of green veiling (residue) left in the backing area. Decreasing this control will cause foreground edges and transparencies to become magenta.

Blue Veil: This control overrides the automatic suppression of the blue channel. Increasing this control will increase the amount of blue veiling (residue) left in the backing area. Decreasing this control will cause foreground edges and transparencies to become yellow.

ultimatte controls

Foreground Color Controls for matching foreground and background shots



A flawless composite requires matching blacks, whites and gammas between foreground and background elements. Ultimatte's Color Controls allow you to visually match the black, white and gamma values between the foreground and background shots.

Foreground Level

These four controls allow you to individually adjust the Red, Green or Blue RGB levels. The master control lets you adjust all three of these values simultaneously.

Foreground Gamma

These four controls allow you to individually adjust the Red, Green or Blue RGB gamma levels. The master control lets you adjust all three of these values simultaneously.

Foreground Black

These four controls allow you to individually adjust the Red, Green or Blue RGB black levels. The master control lets you adjust all three of these values simultaneously.

Background Color Controls for matching foreground and background shots

Background Level

These four controls allow you to individually adjust the Red, Green or Blue RGB levels. The master control lets you adjust all three of these values simultaneously.

Background Gamma

These four controls allow you to individually adjust the Red, Green or Blue RGB gamma levels. The master control lets you adjust all three of these values simultaneously.

Background Black

These four controls allow you to individually adjust the Red, Green or Blue RGB black levels. The master control lets you adjust all three of these values simultaneously.

Saturation Controls

The controls in the saturation menu can be used to adjust the RGB saturation of your footage. You can adjust either the foreground saturation, the background saturation or both. Saturation affects the chroma (color) level of the image without affecting the luminance.

For more information about *Ultimate* compositing, read the appropriate section in the *Ultimate Overview Manual*.



Ultimate Summary

- ***Nest the Ultimate Plug-in onto Video Track Two (V2)***
 - ***Select the Backing Color***
 - ***Adjust the Matte Controls if necessary***
 - ***Adjust the Flare Controls if necessary***
 - ***Adjust the Veil Controls if necessary***
 - ***Adjust the Color Controls if necessary***
 - ***View the Composite***

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with corresponding foreign patents and patents pending.



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