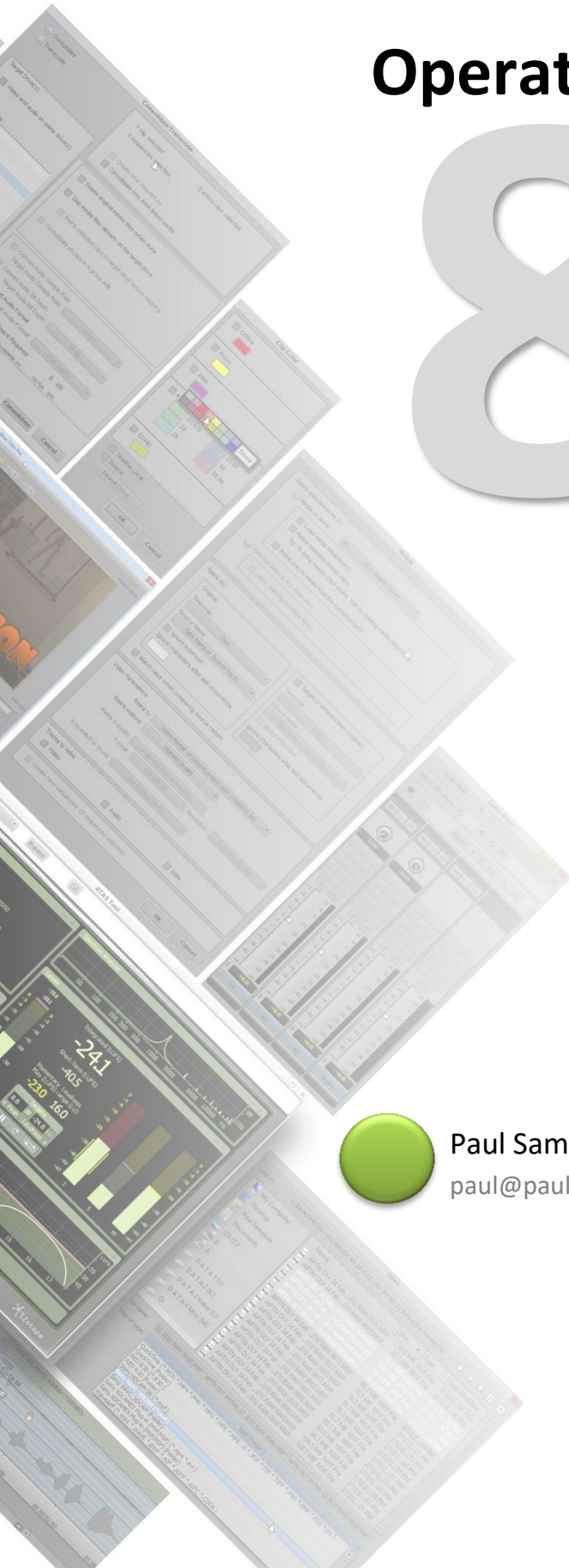


# Media Composer | Software Operators Upgrade Notes

# 8.4



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# INTRODUCTION

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This is not an operations manual, but my outline of the new features in Media Composer 8.4. In this document I assume you are currently editing at good proficiency on some recent version of the software. This document describes what the new features are, but does not necessarily outline the steps to using them. Remember to see the actual documentation from AVID for more detail, or use the built in HELP in the application.

On the pages which follow is my take on the most useful features for operators using these releases of *Media Composer | Software*. It covers standalone features in the editing system, not necessarily features specific to an Interplay server environment.

## Acknowledgements

I would like to thank:

**Jean-François Boisclair**, Avid Product Specialist at CEV in Montreal, for thoroughly reviewing this effort and offering many very useful corrections and suggestions.

**Robert Russo** at Avid (Burlington, USA), who returns all my emails and guides me through my exploration of the new Avid versions. Many thanks Robert.

“Beta” **Keith Gerrard** for allowing me to participate in the Beta program that allows me to get a head start on the new versions.

Despite their help, this document certainly contain errors and omissions, for which of course I alone am responsible.

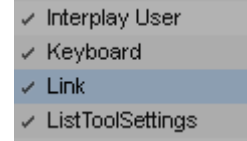
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# TERMINOLOGY CHANGES

## AMA LINKING renamed LINK

Linking is no longer referred to as AMA. This will be noticeable in the FILE menu and the Bin where the menu now shows LINK TO MEDIA, and in SETTINGS where the previous AMA settings have now been renamed LINK (as shown at right).



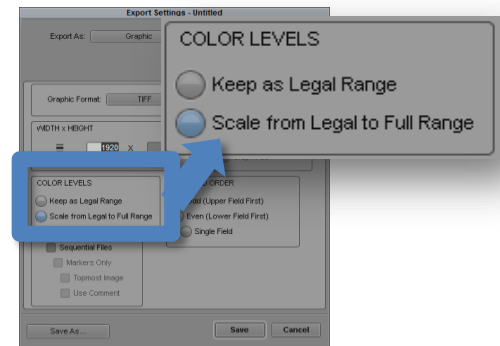
## Color Level Naming in IMPORT and EXPORT settings

While functionally these options have not changed, they have been renamed from previous versions.

EXPORT options:

RGB > Keep as Legal Range

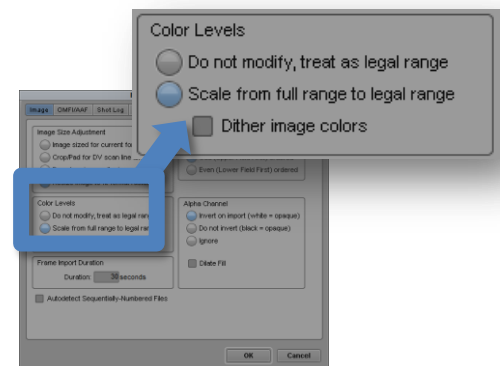
601/709 > Scale from Legal to Full



IMPORT Options:

Computer RGB (0-255) > Do not modify, treat as legal range

601SD or 709HD (16-235) > Scale from full range to legal range



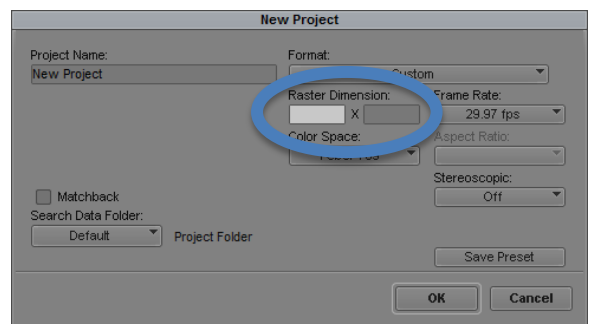
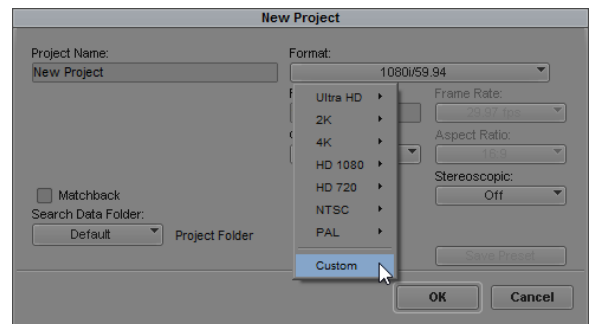
# CUSTOM PROJECT SIZES

Displays in Sports arenas and advertising venues, as well as Video Walls and cell phones often use image sizes which are not a standard format. To accommodate the need to produce content accurately for these devices you may now specify a custom display size. Below is a straight 3:1 custom project.



To create a custom sized Project:

- From the SELECT PROJECT dialogue box, choose NEW PROJECT.
- In the NEW PROJECT dialogue box (right) click on the FORMAT button and choose CUSTOM
- Type in the RASTER DIMENSIONS, WxH, for this project. These values can be from a small of 256 x 120 to a large of 8192 x 8192.



If you wish to use the same project size again, there is a SAVE PRESET button here. Note, especially for class demonstration, it is not currently possible to remove any custom presets you make. A preset manager will be available in a future release.

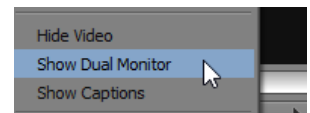
# DISPLAY AND MONITOR CHANGES

## SELECTING SINGLE VS DUAL MONITORS

### Change between Single / Double Composer Monitors

Particularly when editing on a single screen, editing with a single Composer Monitor allows viewing of a larger image in a small space. Previously, we switched between single and double monitors by dragging and resizing the Composer window. You may now more easily toggle between SHOW SINGLE MONITOR / SHOW DUAL MONITOR:

- Right Clicking in the Composer monitor and select from the context menu
- Toggle between the two modes using the SPECIAL menu



### Single Monitor can be much larger

When in Single Monitor mode, you can resize the Composer Monitor Window to essentially fill your screen. While filling your screen is better done with Full Screen Playback (SHIFT + CONTROL + F), this new resize works when you have external hardware attached (Full Screen Playback does not) and allows exceptional flexibility in choosing your image size.

For Effects editing, a large, single monitor can make it easier to design and animate effects, critically evaluate a key, etc.



### Single Monitor Toggle Source (8.0)

When using a single monitor, this button indicates if you are seeing the RECORDER or the PLAYER displayed in the single monitor. You may also click this button (or press ESC) to switch between the two displays.



## RESIZING MEDIA COMPOSER MONITORS

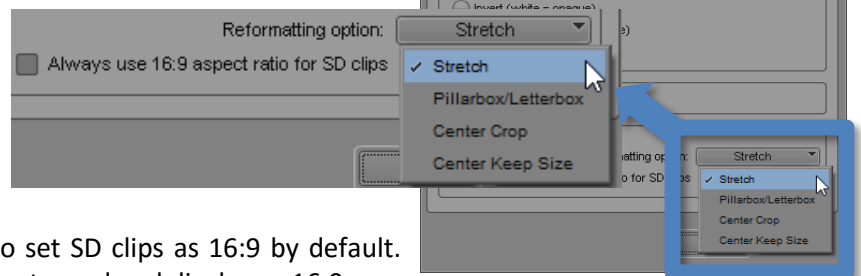
Now that Single and Dual monitors are chosen using a Menu item, it has become easier to resize the Composer monitors. Instead of hunting for the diagonal arrow at the corner of the composer window to resize it, you may now just grab the left or the right edge and drag to make the Media Composer monitors smaller or larger.

## SET DEFAULT ASPECT RATIO FOR LINKED CLIPS

Previously, Linked clips were always stretched to fill the frame on playback. That was the default treatment of material whose aspect ratio did not match the Project.

Now in the LINK settings we have an option to define the behaviour we want for clips whose aspect ratio does not match our project. At the bottom of the LINK settings we can now select to display mismatched clips using:

- Stretch (the default)
- Pillarbox/Letterbox
- Centre Crop
- Center Keep Size

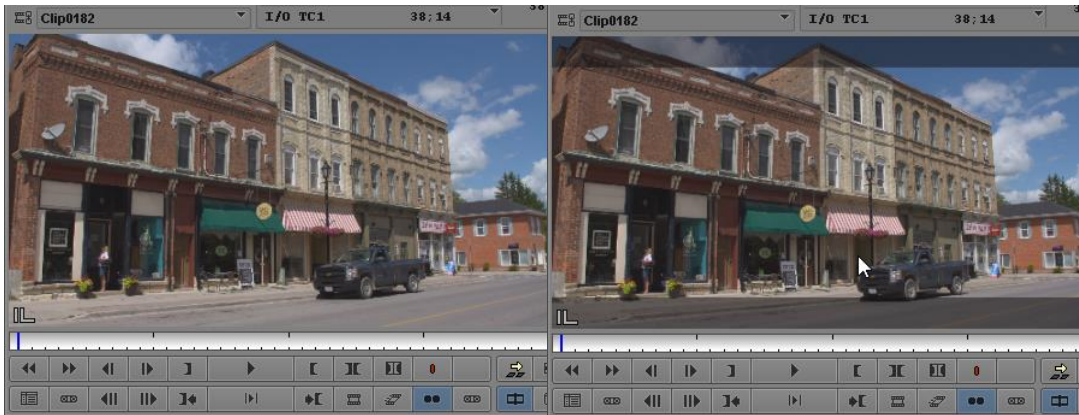


There is also a selectable option to set SD clips as 16:9 by default. This setting forces all SD media to be tagged and display as 16:9.



## VIEWER MASK OPTIONS

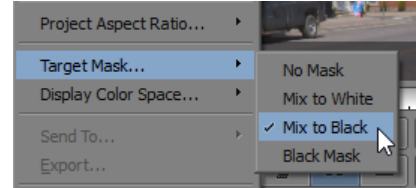
To preview your edit at an aspect ratio different than the one you are editing at, you may apply a Target Mask from the projects FORMAT tab. This will hide or obscure the areas which would be masked lost from your image if it were displayed at maximum size in that frame aspect ratio.



Original 16 x 9 Image

2.35:1 Mask Applied

New in this release, when you right click on a monitor to apply the target mask you will see twobnew option, MIX TO BLACK and MIX TO WHITE which replace the previous option GRAY MASK.





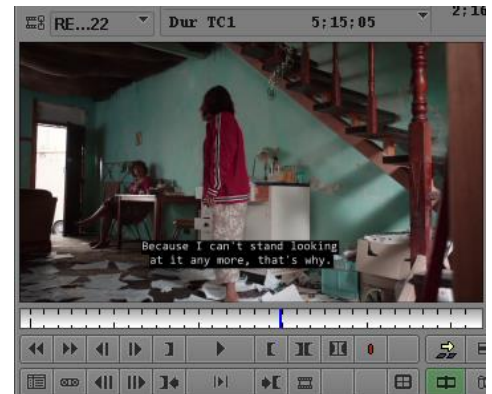
## PREVIEW CLOSED CAPTIONS

Media Composer 8.4 shows Avid is clearly moving towards more captioning support. This 8.4 release allows:

- Captions can be viewed in the editing application.
- The position of captions in the show can be seen and read in the timeline, making editing around captions much simpler
- .scc caption files can be exported directly and quickly. This removes in many cases the requirement to export an MXF file for Caption Maker, which takes more time and considerable drive space.

We can expect future releases to progress so Captions are also editable in the application.

This release shows in the D track, where captions load (black lines) and how long they stay up (grey lines). If he needs to manually edit around caption issues in Media Composer, he could use this feedback to select 'safe' locations for his edits, and speed up the process by eliminating the current trial and error approach.



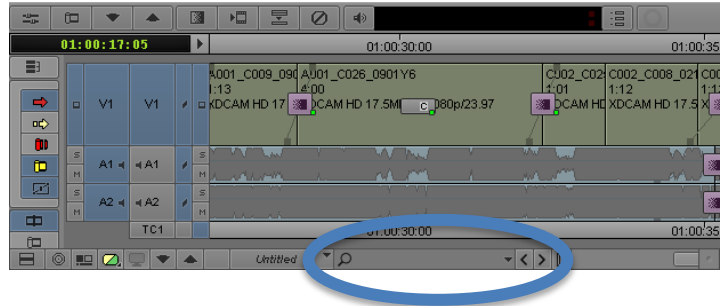
## VIEW AVX CLIPS ON THE CLIENT MONITOR

Previously, when you opened some third-party effects interfaces, such as Boris Red or Film Light's Baselight, the external client monitor would not display the active image from the third-party application. Now, with appropriate hardware, these AVX-2 plugins can display their image under edit on your Output monitor. This allows in many cases a larger and higher quality display to be used as a reference while editing these effects.

## TIMELINE QUICK FIND

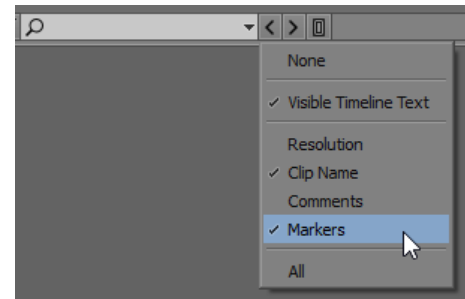
You may now search the timeline for text. You may choose from four predesignated text locations, and also search any of the displayed text visible in the segments in your timeline. The four preset text locations you may search are:

- Clip Name
- Markers
- Comments
- Resolution



They can be selected using the drop down menu to choose them as search targets. These Clip Text locations do not need to be displayed as text on your timeline segments to be searched.

The VISIBLE TEXT option you see here will search any text which can be read off the segments in the timeline. For example, if you are displaying from the timeline CLIP TEXT menu the DURATIONS of your clips, you could type in 1:12 and all segments with that duration would be indicated.



To perform your search, you type in your text and press ENTER. The timeline blue bar will park on the first frame of the segment containing that text. To search again, or search in the opposite direction, click on one of the two 'arrow' buttons immediately to the right of the search text field.

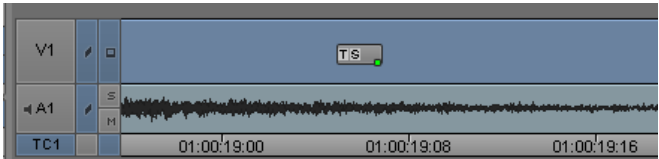


The search is not track sensitive- the track indicators are not used to include or exclude tracks to search.


# CHANGES TO MEDIA APAPTERS

## ADAPTER: DISPLAY IN THE TIMELINE

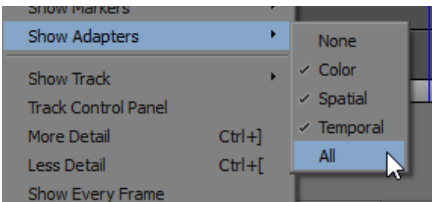
Media Composer allows you to easily mix video clips with different properties – i.e. frame size, frame rate, color space, etc. Any clip that does not match the project’s Format settings is automatically adapted. (Source Settings allow you to change how the system will adapt the video.) When we place one of these clips in the timeline, the segment appears in the timeline with a small green square on the video segment. This indicated an ADAPTER had been applied to this segment. In previous versions, all adapters appeared as a small green square on the segment, with no indication as to the type of adapter being used.



In addition to the green square, we now have an indication which identifies which adapters are being used- we have a new Adapter icon. This icon will have from 1 to 3 letters on it which identifies which adapter or adapters are being applied to that clip.

ICON	LETTER	ADAPTER	DESCRIPTION
	T	MOTION	Temporal (Speed) adjustment
	S	SPATIAL	Source Clip Spatial Size (Frame Flex) adjustment
	C	COLOR	Source Clip Color Adjustment

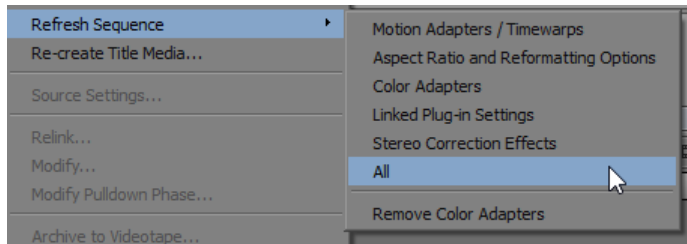
In the Timeline, it is possible to hide or show any combination of these three adapters. From the timeline fast menu, choose SHOW ADAPTERS and select which ones you wish to see.



## ADAPTER: REFRESH SEQUENCE ALL

When a shot with an adapter is used in a Sequence, it will not automatically update if you make changes to Source Settings on the master clip. If you make a change to the shot framing using Frame Flex (a clip source adjustment), this does not automatically change every instance of that shot in every sequence in which it was used.

Clips in a particular sequence may be updated to reflect changes made to the Source clip Settings. This may still be done by selecting the Sequence and using the menu item CLIP > REFRESH SEQUENCE. This menu allows you to be selective, and refresh one of five clip attributes, or ALL of them, in that particular Sequence.



New in this release, we now have a button which will perform a full (ALL options) refresh for us at the tap of a finger. It can be found in the COMMAND PALETTE, OTHER tab. You may assign it from here to your keyboard or to the tool bar of the Timeline.

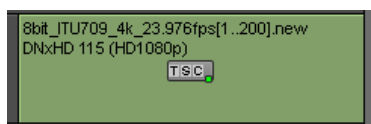


## ADAPTER: Remove COLOR ADAPTERS from a sequence

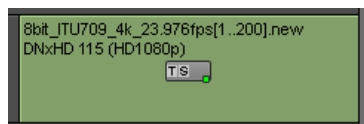
Color Adapters are applied through SOURCE SETTINGS. You may wish to remove all clip SOURCE SETTINGS color adjustments before going to color correction, for example.

Select the Sequence, and from the CLIP menu choose CLIP > REFRESH SEQUENCE > REMOVE COLOR ADAPTERS.

This option is also available through the right click on a Sequence.



Clip before COLOR ADAPTER removal



Clip after COLOR ADAPTER removal

## AAX FACTORY PRESETS

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The AAX Plugins now include the Pro Tools presets for those plugins. These are excellent starting points for your own adjustments, and can make these plugins more accessible to our students. They also provide alternative settings a student can try and explore to understand how the more advanced plugins work.

Click on <factory default> at the top of the dialogue box, and choose PLUG-IN SETTINGS to see the list of available plugins.

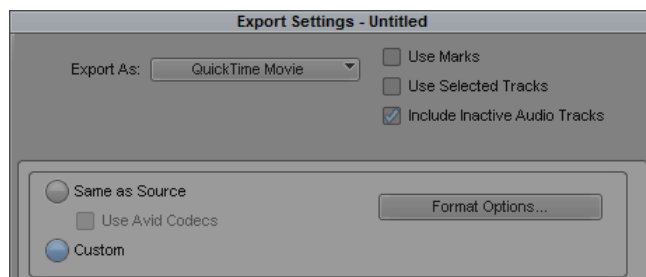


# TRANSCODE and EXPORT

## INCLUDE INACTIVE AUDIO TRACKS IN EXPORTS

There are two small changes in the EXPORT dialogue box.

- USE ENABLED TRACKS has been changed to USE SELECTED TRACKS
- INCLUDE INACTIVE AUDIO TRACKS will export all your tracks, regardless of whether they are highlighted or not. This new option is ON by default.

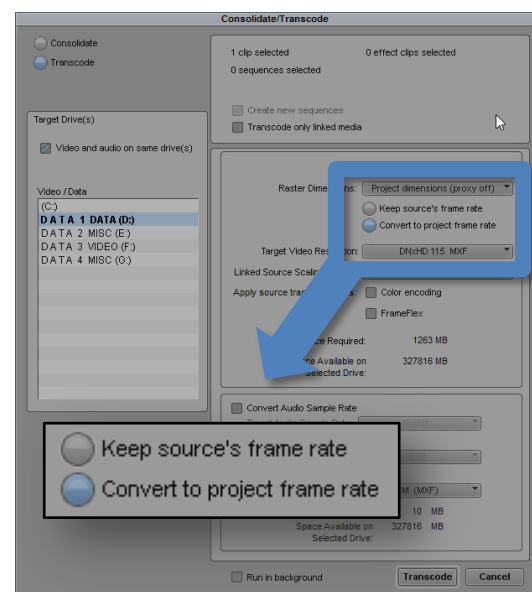


## TRANSCODE MEDIA USING ORIGINAL FPS

When transcoding media, we now have two choices, in all project formats, to determine what frame rate will be used for the transcode. We can transcode at the frame rate of the original footage, or we can transcode at the frame rate of the current project.

While the additional option to transcode to the original media's frame rate was available before 8.4, it did not apply in an SD or an HD project at that time. Now this option is available in all project formats.

Note if you make this change, the speed difference will only appear on the portion of the shot you edit into the timeline. If you watch the shot duration in the Source monitor as you change this setting, you will not notice any difference in shot duration there.



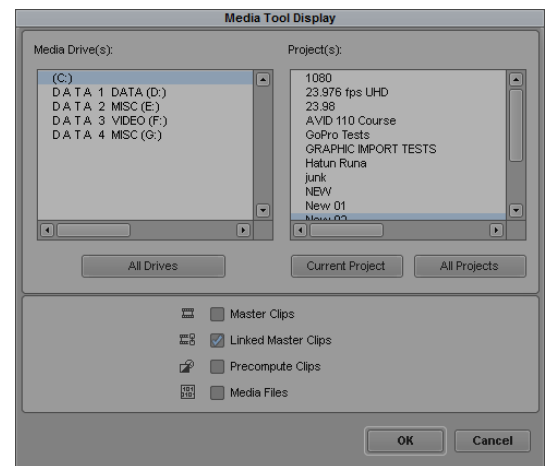
# DELETE LINKED CLIPS WITH MEDIA TOOL

When you Link to media in Media Composer, the clips you link are tracked by the editor. There is an AMA MANAGEMENT folder on your computer where these links reside. You may want to delete these linked file records:

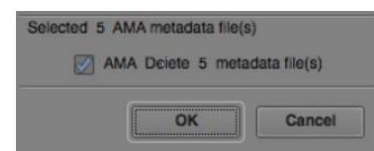
- As part of a full project cleanup to remove traces to clips which are no longer required
- To fix particular linking errors, where clips may have originally been linked into the wrong project and you want them to appear in your system with a different Project Association
- To reduce the size of the AVID MEDIA COMPOSER > AMA MANAGEMENT > AMA METADATA FOLDERS on a system with a lot of linked media or a small drive, such as when an SSD is in use.

Open the Media Tool, and call up the Linked Master Clips for the project or Projects you wish to evaluate

Select the clips you wish to remove and press DELETE



In the dialogue which appears, confirm you wish to delete the AMA clips by placing the checkmark and pressing





# NEW CODEC AND FORMAT SUPPORT

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## XAVC-I NATIVE SUPPORT

Starting in 8.3.1 Media Composer supports Sony XAVC-I larger than HD resolutions. This means you can link and Consolidate (rather than Transcode) this media. This capability is included with the AVID GENERIC MXF AMA PLUGIN, which comes with your system. You don't need to download and install this plugin.

In 8.3.1, playback of Sony MXF wrapped XAVC-I media is not supported natively, so on this release TRANSCODING into storage will give you better editing performance than Consolidating into storage.

Starting in Media Composer 8.4, Support for the current AMA plugin (PDZK-MA2 v 3.4, January 2015) from Sony was added. Playback of XAVC-I is now natively supported which provides better performance.

## APPLE PRORES NATIVE SUPPORT

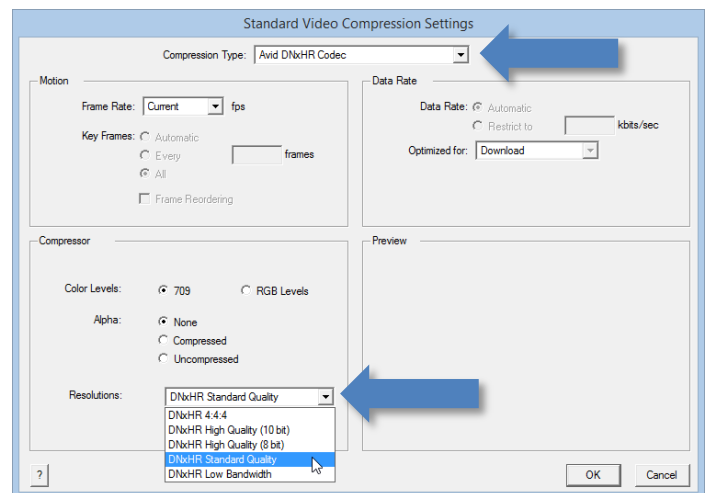
Media Composer now includes native support for Apple ProRes 2K/4K/UHD media. Link to Apple ProRes media and playback the clips in realtime.

## ALPHA SUPPORT FOR QUICKTIME DNXHR

The new Avid codec for High Resolution media – DNXHR, may be exported as a QuickTime wrapped file (8.3.1) and this file may have an Alpha Channel with it (8.4). After Effects and other third party applications can use the codec to render out high resolution (such as 4k, UHD, 2K) animations with an alpha channel.

We use the standard QuickTime EXPORT dialogue.

1. Choose COMPRESSION TYPE to be AVID DNXHR CODEC
2. Choose RESOLUTION to be the DNXHR Resolution you require.



To save the Alpha Channel, export as DNXHR 444 from the rendering application. This file will FAST IMPORT or LINK within Media Composer.

## BACKGROUND SUPPORT IN MC 'CLOUD'

Media Composer | Cloud will now support these background processes:

- Background Render
- Background Transcode
- Dynamic Media Folders