



# OnTheAir Video 4

# OnTheAir Video Express 4

## User Manual





# OnTheAir Video User Manual

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# OnTheAir Video User Manual

## About OnTheAir Video 4

OnTheAir Video (OTAV) is a macOS application that allows you to broadcast almost any video clip that can be exported directly from Final Cut Pro or any other editing software. It can be used by television stations, large or small, network or closed circuit, to broadcast programs or as video player for news or live television programming. OnTheAir Video is also intended to be used for live performances, shows, exhibitions, trade shows, information kiosks, etc. Its use is solely limited by the imagination.

### Simplicity

The User Interface has been designed to be easy to use. It is the key of OnTheAir Video's success.

### Flexibility

OnTheAir Video is also very flexible, it supports multiple formats (HD, 4K or 8K) and a wide range of codecs. It means it integrates easily with past, present and future systems. Receive a file from a production facility, drag and drop to your playlist your file is ready to be aired without having to compress it or convert it.

OnTheAir Video does not require any proprietary hardware, either. Almost any recent Mac can be used. Add a video card (PCIe or Thunderbolt) or output to NDI and start broadcasting. It is also easily integrated into traffic or automation systems.

### Security

OnTheAir Video is based on a macOS architecture which is known for reliability and flexibility. All solutions developed by Softron Media Services are fully tested and approved before released. Prompt and personalized support is also what we do best.

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**OnTheAir Video 4** is a very intuitive program with a lot of features and functions. What follows is a brief explanation of how to use the application, beginning with installation instructions, followed by a description of the User Interface and then with instructions on how to get the most from the application.

In addition to this user manual, you can also find a lot of information:

- on our website: [www.softron.tv](http://www.softron.tv); at the bottom of [the OnTheAir Video page](#) you will find:
  - <http://softron.tv/downloads>: to download the latest version of OnTheAir Video.
  - [Tech Specs](#): where you will find recommendations on what you need, what drivers to use, what video cards and codecs are compatible, etc.
- in our [Release notes](#).
- on our support desk, there a lot of information is available in the [help center](#).
- on our [YouTube channel](#),
- and don't forget to follow us on Twitter and Facebook for the latest Softron news.





# OnTheAir Video User Manual

## What's New in OnTheAir Video 4.2 ?

With the release of OnTheAir Video 4.2, a lot of changes were made:

- **New Actions:** Previously, in OnTheAir Video 4.1 or earlier, actions were only AppleScripts. With version 4.2, actions can be other things than AppleScript in order for example to control the DGO or video routers directly. These new actions required us to change the playlist format to save these actions. Thus there could be issues when going back and forth between version 4.2 (or later) and earlier versions of OnTheAir Video which were using different actions. Here is the behavior to expect:
  - > *When going from version 4.1 to 4.2:*

Actions will be converted to the new actions with attributes, there is nothing to do. You can save the playlist in the new format and if you only use AppleScript actions, you can go back and forth between version 4.1 and 4.2, but not if you use other types of actions.
  - > *When going from version 4.2 to 4.1:*

If you were using only "AppleScript" actions in version 4.2, there will be no issue. If you used other types of actions, you will be able to open the playlist in version 4.1, but if you save your playlist in version 4.1, you will lose all "non-AppleScript" actions and you won't be able to retrieve them when reopening with version 4.2. So make sure to disable auto-save in that case.
- **Scheduler:** New "Calendar" type of user interface.
- Added the ability to trigger an Action when a **SCTE trigger** is received on a video input.
- **Remote:** Added the "Remote Pack" option with the ability to control OnTheAir Video, view and edit opened playlists (Using : [http://127.0.0.1:8081/web\\_ui/index.html](http://127.0.0.1:8081/web_ui/index.html)).
- **Traffic Option:** Added support for BXF playlist format
- **REST API:** Added the ability to get info and modify the currently playing clip. Added the ability skip to next only on live items. We recommend using the same OnTheAir Video versions for the client and the server. Particularly if you are using actions.
- Added the ability to use **transitions when controlling an ATEM:** select an input in preview, then do the "auto transition" (only with the new actions); we also added a "none" to the ATEM triggers so you can connect to an ATEM (to control it using the new OnTheAir Video actions), but it won't trigger any playback action in OnTheAir Video
- Issues with port number when using multiple remote instances on the same Mac

... And many new features on their way !

To see the latest news, improved features and all the details, go to [our Softron website](#).  
If you want to submit a request, contact [our support team](#), always ready to help you!



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## Main Differences between OnTheAir Video and OnTheAir Video Express

**Important Note:** In this document, to keep things simple, we will mainly use the words "OnTheAir Video" and "OTAV". We will just indicate which features are only for OnTheAir Video, so if you are using OnTheAir Video Express you can skip these parts.

We offer two versions of our playout application. OnTheAir Video Express is the "entry-level" playout solution from Softron, while OnTheAir Video offers more advanced features.

You can compare the two versions in the [feature list of the OnTheAir Video page on our website](#).

Features that are only available in OnTheAir Video:

- **Built-in CG:** (Requires the Dynamic Graphics Overlay Option) In addition to still images, you can now import CG Projects in OnTheAir Video to be overlaid on top of the video playback.
- **Transitions:** You can use either built-in transitions, such as cross-fades, or custom transitions (made with your own movies with an Alpha Channel).
- **Secondary Audio Output:** In addition to the video output on the selected video device, you can now also output to another available audio output on your Mac. Works with CoreAudio, so supports the audio devices that are available for macOS (including Dante or MADI).
- **Scheduler:** Prepare your playlists and schedules in advance and let OnTheAir Video do the rest. OnTheAir Video can play 24/7 for days and days without having to worry about it.
- **Remote Control** (Requires the remote pack option): use a simple web browser on another computer or another OnTheAir Video to control your playout remotely.
- **Traffic option:** Create your playlist (or log) in your traffic solution, such as Wide Orbit, and OnTheAir Video will import it and play it out. The traffic option includes the "Remote Pack" option.
- **LIVE sources:** Use NDI or any video card input as a clip in your playlist to playout live programs.
- **Streaming input:** Supports RTMP video input to play a web stream easily. Just add a "stream clip" to your playlist, enter the RTMP url and start playing it back.
- **Closed Captioning.** (Requires the CC option). It is supported in an MXF file with OP47 or using sidecar files in .SRT or .STL extension, or embedded in a QT file in either CEA 608 or CEA 708.
- **REST API:** OnTheAir Video is now coming with a full REST API that allows to control it remotely from a webpage.
- **Actions** (Secondary events)
- **Ability to control a Video router:** Blackmagic-Design Videohub or a Ross video router without the need of OnTheAir Switch. This can be done using Actions.
- **Support for SCTE triggers.** (Requires the CC option)
- **AppleScriptable.** Controllable by AppleScript.



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## Before the Installation

If you use a video device from AJA, Blackmagic Design or Deltacast, make sure the device is physically connected. Double check that all cables and hardware are installed correctly.

Also check that you have the appropriate version of the driver and OS:

1. On the Softron website, [check which driver and OS](#) is recommended for your card.
2. Download the appropriate driver from the [AJA](#), [Blackmagic-Design](#) or [Deltacast](#) website.
3. Make sure you use a compatible version of Mac OS

## Mac and MacOS Requirements

OnTheAir Video 4.2 requires :

- **Computer:** Mac Intel or Silicon (A [graphics card that supports Metal](#) is required for the SMART Resize and Graphics option)
- **MacOS:** 10.15.5 or later (14.00 or later recommended)
- **Memory:** Min. 4 GB RAM for Single playback (add 2GB of RAM for additional channel)

Other requirements will depend on what you intend to do. Which format, fps, codec of video files you intend to play? Will you be using the DGO option? A 4-core 2018 (or later) Mac mini should answer most of the needs for one HD channel. [More infos in our website.](#)

## Video / Audio Output

OnTheAir Video 4.2 also requires :

- Video outputs:
  - A PCI card or Thunderbolt device from AJA, Blackmagic Design or Deltacast
  - NDI
  - It is not possible to output with the built-in video monitor output of your Mac
- Video inputs:
  - A PCI card or Thunderbolt device from AJA, Blackmagic Design or Deltacast
  - NDI
  - Stream (RTMP, RTSP, HTTP, HLS)

To know which cards are supported at the time of reading, have a look at the [Softron website on the OnTheAir Video Specifications page.](#)

For multichannel, you can either install multiple cards or connect multiple thunderbolt devices, or use a device that supports multiple channels.

It should not be an issue to upgrade drivers of your video card. However, it happens from time to time that some issues appear when upgrading drivers. So always do a test on another computer first and stay tuned with our website to be informed about possible issues. If you encounter any problem, contact us using the [Support Contact page](#) from the website.



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## Storage

You should be able to use any volume that will mount on your Mac to read the video with OnTheAir Video. But, of course, you need to check that the data rate is sustained considering the codec and file format you are using.

You can use OnTheAir Video with the internal disks of your Mac. But if you are working with a large number of files or with High Definition files, we recommend you work with Fibre.

## Supported Codecs - File Formats

### Video Codecs

Format	Support
Apple ProRes 422 Family (Proxy, 422, LT, HQ)	✓
Apple ProRes 4444 (4444, XQ)	✓
AVC-Intra (50, 100, 200)	✓
AVCHD	✓
Avid DNxHD	✓
Avid DNxHR	✓
DV-PAL	✓
DV/DVCPRO-NTSC	✓
DVCPro-PAL	✓
DVCPro HD	✓
DVCPro 50	✓
H.264	✓
HDV	✓
HEVC	✓
MPEG IMX (30/40/50)	✓
MPEG-2	✓
MPEG-4 Video	✓
None	✓
Photo-JPEG	✓
Speed HQ (Newtek)	✓
Uncompressed	✓
XDCAM EX	✓
XDCAM HD	✓
XDCAM HD422	✓

### Stream Clips Types

Protocol	Support
RTSP	✓
RTMP	✓
TCP	✓
HTTP	✓
HLS	✓

### Audio Codecs

Format	Support
AAC	✓
Apple Lossless	✓
MP2	✓
MP3	✓
Linear PCM	✓

### Video Wrappers

Format	Support
AVI	✓
DV	✓
M2T	✓
M2V	✓
M4V	✓
MP2	✓
MP4	✓
MPEG	✓
MPG	✓
MXF OP1a	✓
QuickTime (MOV)	✓
Transport Stream (ts)	✓

### Still Image Formats

Format	Support
BMP	✓
PSD	✓
GIF **	✓
JPEG	✓
JPEG 2000	✓
PNG	✓
Targa	✓
TIFF	✓



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This list of supported codecs may have been updated. make sure to check the specifications section of the product page [on our website](#).

## About VANCs

Some additional information can be encoded in the video lines called VANC. This information can be, for example, Closed Captioning in the USA or OP-47 (Teletext) in Europe. OnTheAir Video will not write anything to these lines, but it will be transparent: if there are VANC lines in the Video signal, with the Closed Caption paid option OnTheAir Video will send them to the Video Card. .

Before deciding on one card or the other, check with the manufacturer if VANC lines are supported and that this card is supported by your Softron application.

## Subtitling with OnTheAir Video

OnTheAir Video 4 supports different ways to add subtitling to your video, either embedded in the video file directly, or as a sidecar file, with the Closed Caption paid option. Below are the supported formats and requirements.

### CEA608/708

- Embedded in a QuickTime media file: Supports a QuickTime Closed Captioning track, in CEA608 or CEA708.
- Embedded in a MXF media file: Supports a Closed Captioning track in CEA708
- Sidecar file: Supports SRT files\*

### OP47

- Embedded in a QuickTime media file: Not supported.
- Embedded in a MXF media file: VANC packets with DID 0x43/SDID 0x02
- Sidecar file: Supports SRT and STL file\*

More information about CC in [chapter “Closed Captioning”](#)



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## Software Installation

1. Download the software from [our website](#).
2. Unzip the downloaded file.
3. Drag and drop the OnTheAir Video (or OnTheAir Video Express) application into your applications folder.

## First Start

1. **Double click on the OnTheAir Video icon** or select the icon in the Applications folder and use your File > Open command to launch the application.
2. When prompted with the message that “OnTheAir Video.app is an application downloaded from the Internet. Are you sure you want to open it?” Click on **Open**.
3. A license agreement window will open. Enter your name and email address for the registration. Tick the check-box and click on “**Accept**.”
4. Enter an **admin password** to install the required components.
5. **If you have a dongle connected** to the computer with valid licenses for OnTheAir Video, the application will start right away.
6. **If you do not have a dongle connected**, a license window will open to offer you three choices:
  - **Register:** if you own a serial number, click on this button and follow the procedure to activate it. You can [read more about the activation procedures](#) on our support desk.
  - **Buy:** if you don't have a serial number, but want to buy one, click on that button.
  - **Demo:** if you want to try the application in DEMO mode, click here. In DEMO mode, OnTheAir Video is fully functional. The only limitation is that a blue frame will be written to the file every few seconds.

Note that the license window will only open the first time you start the application. If you want to add a license, or upgrade later on, you can access the license window in the Menu “OnTheAir Video 4 > License...”

7. That's it — you are ready to use OnTheAir Video 4!



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## 1. Quick Start

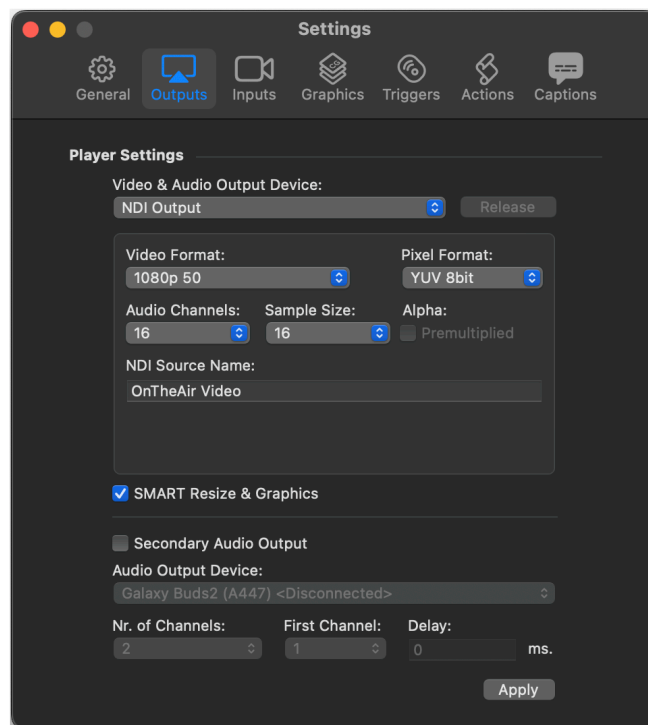
OnTheAir Video 4 (OTAV) is a very intuitive program, with a lot of features and functions. Before diving into the menus and features, and everything that the application it offers, let's jump in and start playing some files. For that, we will create a playlist. But first, let's take a look at some of the OnTheAir Video settings.

### 1.1. Set Up the Video and Audio Output.

The first thing to configure is what video and audio output you will use. To do that, go to the menu "Settings > Outputs".

Select the device that will be used as the main video and audio output. A reminder that OTAV supports AJA, Blackmagic-Design and Deltacast cards and Thunderbolt devices, as well as NDI.

You will find this window :



In that area, you'll also be able to set the Video Format, Pixel Format, Audio Channels, and Sample Size of the audio. If you select the ARGB pixel format (when the card supports it), you will be able to select External or Internal Key and set if the Alpha is Premultiplied or not.

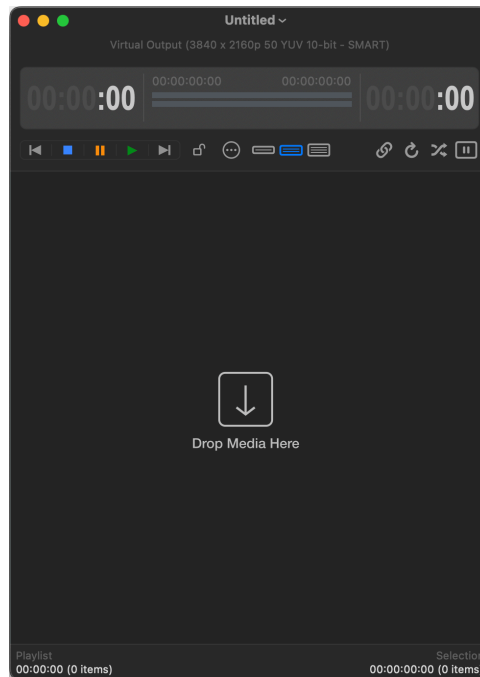
We will not enter the full details right now. To have all the explanations on the outputs and the player settings available, [go to chapter "Settings"](#).



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## 1.2. Add Files & Play

Now that you have set up an output, we can start playing some files. For that, you can use the one that has been automatically created when you started OTAV, or you can create a new one by going to the menu “File > New Playlist”, or using the keyboard shortcut “command + n” ([More shortcuts here](#)). You should now have an empty playlist:



Now you can add some files (a video, a still image, or an audio file) to your playlist by using any of these methods:

- Drag-and-drop a file from the Finder.
- Select the menu “File > Add > Media Files...” (or alt + ⌘ + A ) and in the window that shows up, select any compatible media in your hard drive.

Note that the clip will be added before the currently selected clip, or, if no clip is selected, at the end of the list.

Once your files are in the playlist, start playing them:

- Select the clip you want to play, (if no clip is selected, we will start playing the first clip in the playlist) and:
  - > Click on the green “Play” icon at the top of the window.
  - > Use the space bar, or trigger through a hardware device.
- Or simply double-click on a clip.



Note that there is an option (*Double click inspects instead of playing*) that will change that behavior, so if double-clicking on the clip opens the inspector instead of starting the playback, you can check the “OnTheAir Video > Settings > General”.

That’s it, your first file starts playing out!





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OTAV is what is called a “Document based” application as its is based on documents (playlists). Our playlists are simple documents that you can save and copy to a different storage, as you would with any other type of document on your computer, so it's very easy to handle.

## 1.3. Output Preview

Now, let's view what you are playing out. For this, open the output preview window either by:

- Selecting the menu “Window > Output Preview”
- Using the keyboard shortcut “command + ⌥ + p”

This will open a preview window :

This window can be resized and could even be set in full screen on an external monitor. However, we do not recommend using this as a broadcast output. This preview window, as



its name implies, is made for preview. For a broadcast operation, you can use affordable devices from AJA and Blackmagic-Design, which both have small Thunderbolt devices with HDMI support.

Now that you have a small glimpse of OnTheAir Video 4, we will go through each feature of the Menu. Let's start with the playlist.



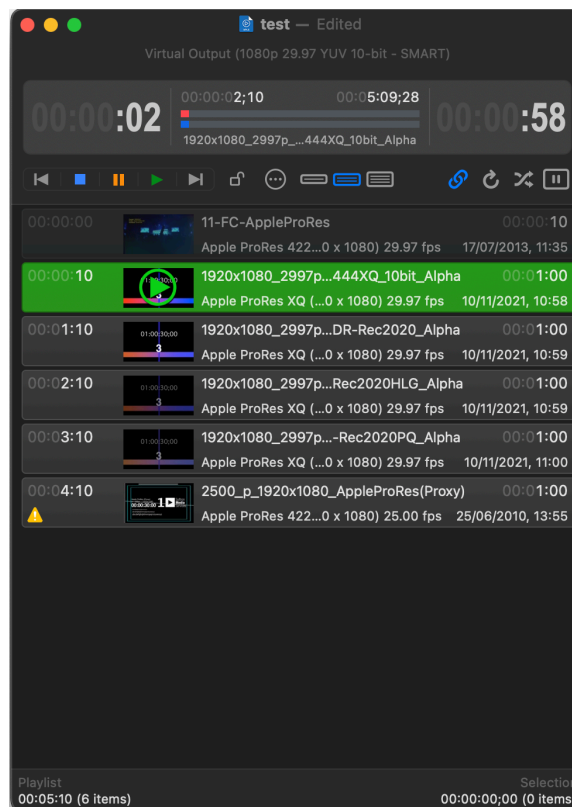
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## 2. The Playlist

A quick reminder: to create a new playlist go to the top menu “File > New Playlist”, or use the keyboard shortcut “command + n”.

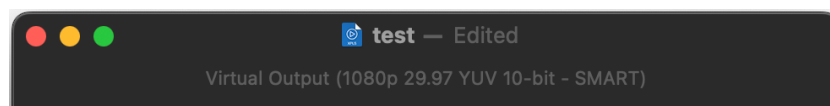
### 2.1. The User Interface

Here is a classic playlist window, followed by a description of each feature:



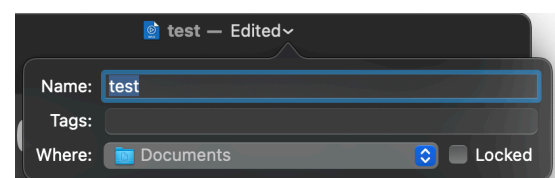
#### 2.1.1. The Title Bar

This is the Title Bar of the playlist currently being played, and it shows which output is being



used for the playlist. If Smart Resize is being utilized, it will show this next to the Output.

You can change the title by clicking on the ▾; this will open a popup that allows you to select the title, any tags associated with the file, and the location of the file.

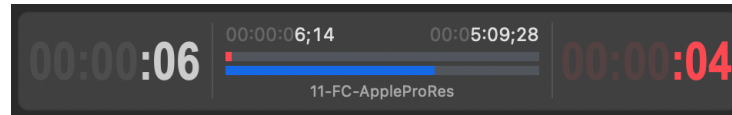




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## 2.1.2. The Timecode Bar

This bar shows time information for the playing clip:



- The larger number on the left shows how long the clip has been playing, while the one on the right shows how much time remains on the clip.
- Note that by right-clicking on either of those timers you can change them to read the playing time / time remaining of the playlist as a whole, rather than just the clip in play.
- Between those timers are two bars. The blue bar shows the progression of the clip, while the red bar shows the progression of the playlist.
- Double-clicking on the blue bar opens the scrubbing line, and by clicking at any point on the line you may move the clip to that point.
- Above the bars are two smaller timers. The one on the left shows the current playtime of the clip in play, while the timecode on the right shows the entire duration of the playlist.
- Below the bars is the title of the clip currently in play.

## 2.1.3. Playback Controls



The Playback familiar to almost from left to right:

Controls will be everyone. They are,

*Play Previous Clip - Stop Clip - Pause Clip - Skip to Next Clip - Lock*

Clicking on the Lock button disables most of the functions on the UI, preventing anyone from inadvertently clicking on a button while the playlist is playing, potentially disrupting the playout. Clicking again on the Lock button unlocks the functions.

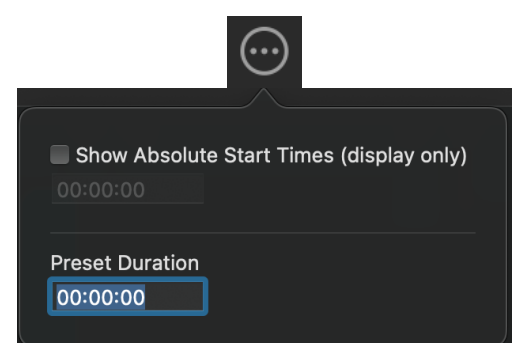
## 2.1.4. Playlist Settings

To the right of the Playback Controls you have an ellipsis icon.

It allows you to set a preset duration for your playlist. For example, if you want a one hour program, the playlist will show you the runtime and the under runtime.

Very useful with the scheduler option. [Explained in the chapter "Scheduler"](#).

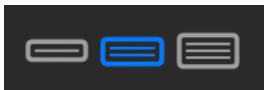
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To the right of this icon, there is the Detail Level panel, and these controls allow you to select how much detail is displayed about the clips in the playlist.



There are three levels of detail that may be selected:

- The *lowest level* shows only three things about the clip: how much time into the playlist the clip will start; the clip's title; and the duration of the clip.
- The *second level* of detail shows the above information, and also shows a still shot from each clip.
- The *third level* displays the above information, plus the video format of the file and the date and time that the clip was created.

To the right of the Detail Level panel are the four Options buttons:

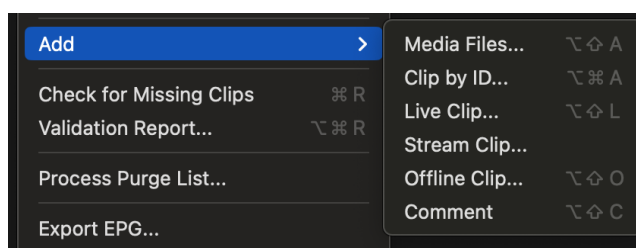


- 1 The **Chain** button sets the playlist to automatically play each clip in succession.
- 2 The **Loop** button causes the clip to replay after it finishes playing. If the Chain button and the Loop button are both in use, the clips will play in order, and the playlist will replay from the beginning upon the completion of the final clip.
- 3 The **Randomize** button makes a random mix with all the clips inside the playlist. It allows you to play it multiple times, with the same clips, but with a unique sequence every time.
- 4 The **Cue** button puts OnTheAir Video into Cue Mode. While in Cue Mode, each clip will stop on the last frame. The user will then have to click the Play button (or hit the space bar) to go the next clip, where it will pause on the first frame. Clicking Play again (or pushing the space bar) will start the clip. Note that the Cue Mode cannot be enabled while the Chain or Loop functions are enabled.

## 2.2. The Different Clips

To add a clip in your playlist, go to the top menu “File > Add”. You have a few options:

- **Media files:** Videos in your files.
- **Clip by ID:** Use the ID to add the clip.
- **Live Clip:** From a live source.
- **Stream Clip:** From a stream source.  
[Go to chapter "Streaming inputs in OTAV".](#)
- **Offline Clip:** An empty file for a clip that is not exported yet.
- **Comment:** Text you want to put between the clips of your playlist.



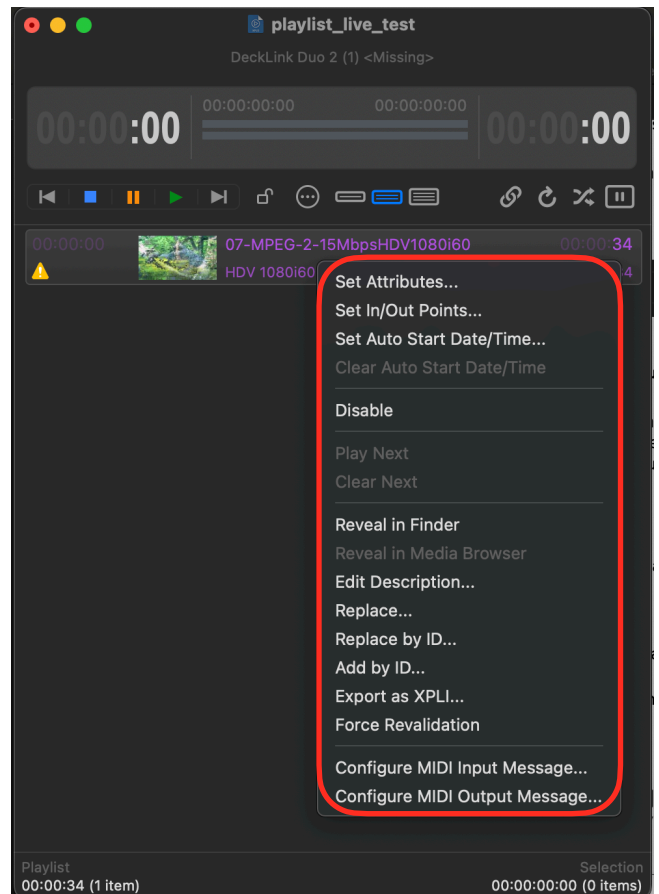


# OnTheAir Video User Manual

## 2.3. Contextual Menu

Below the Playback Controls, Detail Levels, and Options is the Playlist Queue. You can drag clips into the playlist or open a previously constructed playlist. Right-clicking on a clip opens a popup with a number of options for that clip. The function of each option is described briefly:

- **Set Attributes...:** This feature brings up the Clip Inspector for the highlighted file, and is open to the Attributes tab. For more information, see the window menu: Clip Inspector.
- **Set In/Out Point...:** This brings up the Clip Inspector as well, open to the Timeline tab.
- **Set Auto Start Date/Time...:** When put on a clip, it will automatically play it at the time and date set. A unique clock will appear on the select playlist. **Clear** will disable the setting.
- **Play/Clear Next:** Choose the next clip of the playlist you want to play.
- **Disable/Enable:** This will disable or enable the broadcast of the clip in the playlist.
- **Reveal in Finder/Media Browser:** This opens the Finder or Media Browser window, showcasing the selected clip in its Folder.
- **Edit Description...:** When you want to replace a clip with another one, it is often quicker to just enter its ID, rather than searching for it in the playlist. You just need the traffic option and have correctly [set the media folder](#).
- **Replace...:** This opens the Finder window as well, listing the files in your selected Media Folder. From there you can click on a file you would like to use in place of the highlighted clip in the playlist; clicking the Open button replaces the original clip.
- **Replace/add by ID...:** Replace or a clip using its identifier
- **Export as XPLI...:** Export a file containing information related to the clip (like set attributes, In/Out Point...). See the window menu: [Clip Inspector](#).
- **Force Revalidation:** To make a new verification of the information related to the clip.
- **Assign MIDI Input Message...:** Allows you to assign a MIDI note to control the clip.
- **Configure MIDI Output Message:** This allows you to set the Channel and Note for use with MIDI.





# OnTheAir Video User Manual

## 2.4. Folder-Based Playlist

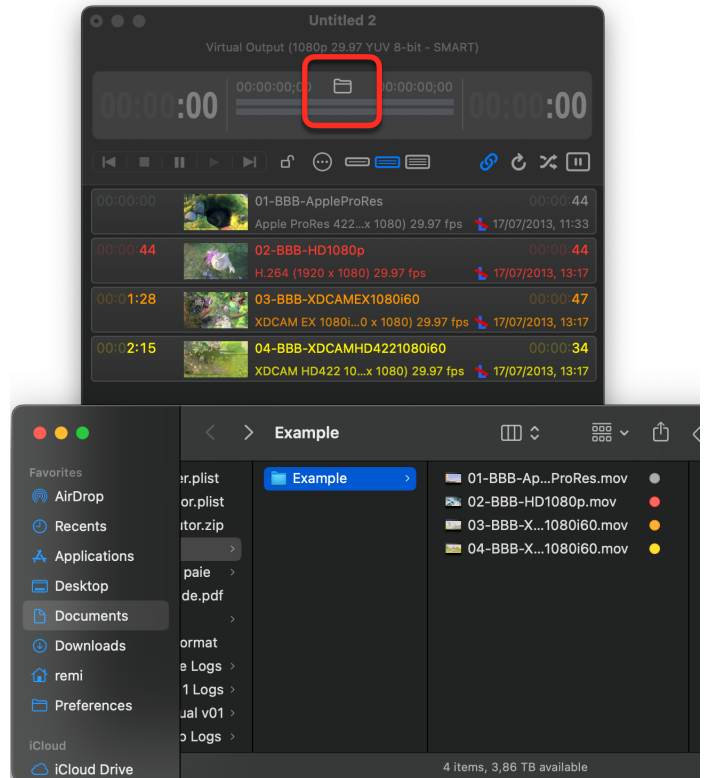
A Folder-Based Playlist allows you to control your playlist via a folder. To create one:

- Go to the top menu “File > New Folder-Based Playlist”
- Use “⌘ + command + n”

When it is created, OnTheAir Video will ask you to select the folder you want to use with this playlist.

On the right, an example:

- Here is a Folder-Based Playlist and the folder that is used in the Finder.
- At the top (surrounded by red), you can see a file logo. It means this playlist is Folder-Based. If you click on the logo, it will open the folder in your Finder.
- Four clips were added in this folder and they appeared in the playlist.
- You can add and remove clips from the folder. It will automatically update the playlist.



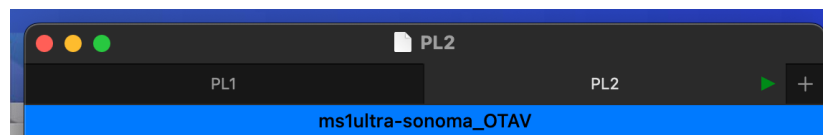
## 2.5. Remote Playlist

Not available in OnTheAir Video Express.

For this feature, [the Remote pack](#) paid option is necessary.

It gives you the ability to open a playlist from another OnTheAir Video on another computer or through a web browser. To do that you have to use the remote control option, explained [in the chapter "Remote Control"](#).

The Remote playlist has a different tab:



It gives you the name of the playout channel and also lists of all the playlists open on that computer. You can also create a new playlist, which will be stored on the Media Folder from that computer. Everything is fully explained [in the chapter "Remote Control"](#).



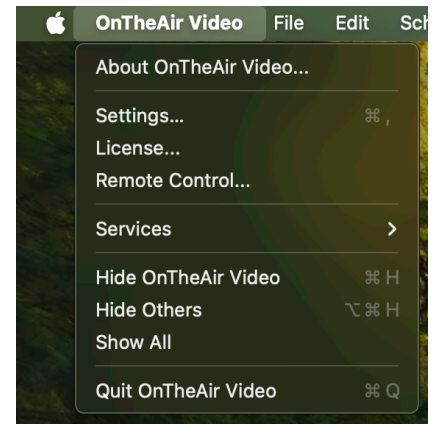


# OnTheAir Video User Manual

## 3. Settings

To set up your OnTheAir Video you will also need to go to the top menu. To begin, Clicking on the “OnTheAir Video” tab on the menu bar brings up a list of options.

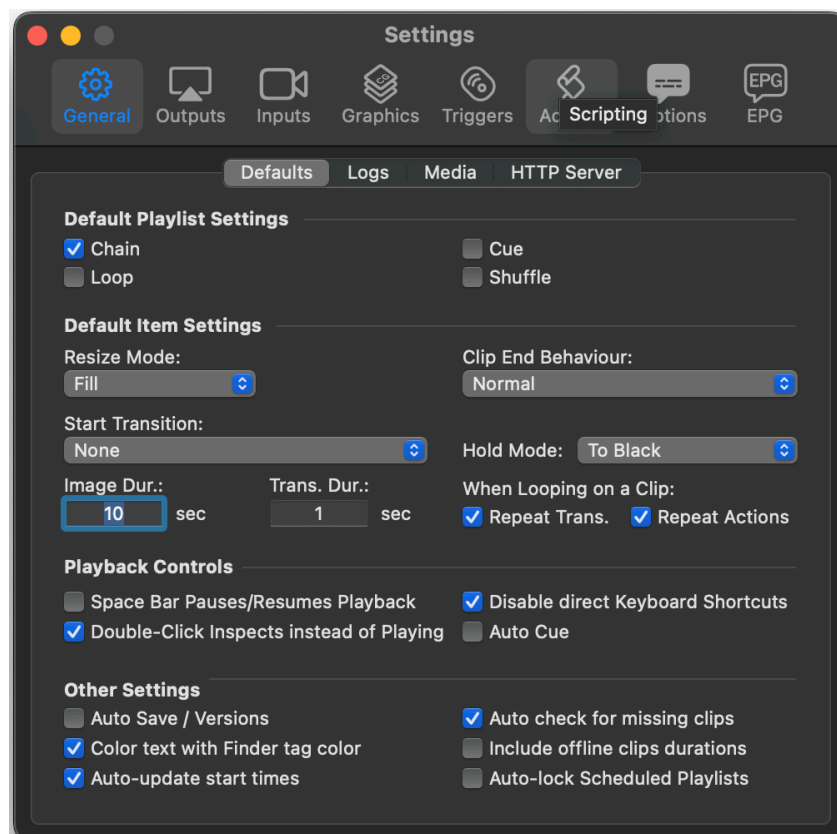
If you open “About OnTheAir Video...”, this brings up some basic information about OnTheAir Video, including the version number, license information, and copyright information. Clicking on the More Info... button opens up another window wherein are displayed any options (such as Dynamic Graphics Overlay, Closed Captioning, Remote Pack...) you have enabled on your OTAV license.



The Settings panel (formerly called “Preferences...”) is very important to set up your OnTheAir Video. You already saw an overview of [the “outputs” in chapter "Quick Start"](#). Now we will go further through each option.

### 3.1. General

Clicking this opens the General panel, which allows you to set defaults for your OnTheAir playlists and clips. This will not affect anything in the current playlist, but rather anything dragged into the playlist from another folder.





# OnTheAir Video User Manual

## 3.1.1. Default Playlist Settings

### Default Playlist Settings:

- **Chain:** With this box enabled, newly added clips will be in Chain mode. The clips are played in succession.
- **Loop:** When this box is enabled, newly added clips will be in Loop mode. It causes the clip to replay after it finishes playing.
- **Cue:** When this box is enabled, newly added clips will be in Cue mode. The clip will stop on the last frame.
- **Shuffle:** When this box is enabled, newly added clips will be in Shuffle mode. It makes a random mix with all the clips inside the playlist.

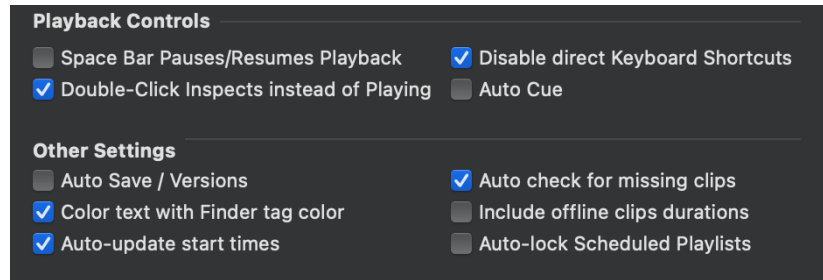
### Default Item Settings:

- **Resize Mode:** Here you can select from three resize modes: Fill; Pan & Scan; and Letterbox.
- **Clip End Behavior:** Here you can set what happens at the end of a clip dragged into the playlist. If Normal is selected, the playlist will continue as before. If Stop at End, the clip will stop when it finishes playing. If Hold Last Frame, the clip will stop at the end and hold in its last frame. If Play Next Clip is selected, the next clip will play immediately after the added clip finishes. If Loop is selected, the clip will replay when it finishes playing.
- **Start Transition:** Allows you to add a [transition](#) between all the clips. A list of transitions is available but you can also edit your own. You can also set the Image duration and the transition duration just below.
- **Hold Mode:** If Last frame is selected, the last frame known will be used on hold. If To Black is selected, a black frame will be used instead.
- **When Looping on a Clip:** If Repeat Trans. is enabled, the start transition will be played every time the clip loops. If Repeat Actions is enabled, the action assigned to the clip will be played every time the clip loops.





# OnTheAir Video User Manual



## Playback Controls:

- **Space Bar Pauses/Resumes Playback:** When enabled, the space bar will pause or resume playback instead of restarting the clip from the beginning.
- **Disable direct Keyboard Shortcuts:** When enabled, keyboard shortcuts that do not require a modifier key (alt /command / ⌘) will be ignored.
- **Double-Click Inspects instead of Playing:** When enabled, double clicking a clip, will open it in the inspector instead of start playing it.
- **Auto Cue:** When enabled, and the playlist is in cue mode, OTAV will automatically cue the next clip two seconds after it hold the last frame of the previous clip.

## Other Settings:

- **Auto Save / Versions:** When enabled, the playlist documents will automatically save when modifications are done. When disabled, you will also lose the versions for this document. Make sure that this works fine in your workflow.
- **Auto check for missing clips:** When enabled, each open playlist will check after missing clip every 10 seconds.
- **Color text with Finder tag color:** When enabled, the text of the entire playlist row will be displayed in the color of the Finder tag used for that clip.
- **Include offline clips durations:** When enabled, offline clips duration are counted in when computing the next clip start time and playlist duration.
- **Auto-update start times:** When enabled, the start times are recalculated every time a clip is started according the realtime clock. **Not available in OnTheAir Video Express.**
- **Auto-lock Scheduled Playlists:** When enabled, the scheduler will automatically lock the playlists when it opens them. More information about the scheduler in chapter "[Scheduler](#)" **Not available in OnTheAir Video Express.**

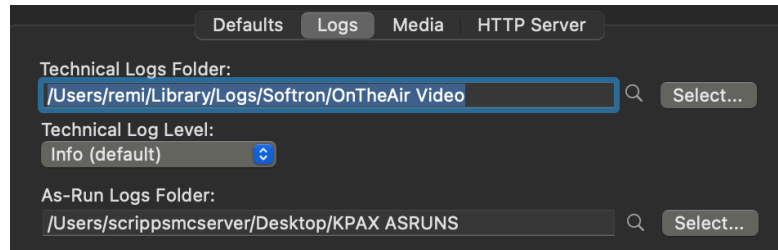


# OnTheAir Video User Manual

## 3.1.2. Logs

Logs are files containing information about activities in a computer system. In the case of OnTheAir Video, it helps to understand what is happening in the app. For example, if you encounter an issue while using OTAV, reading the logs may help you find the solution.

Next to “**Defaults**”, you will find this “**Logs**” window :



### Technical Logs Folder:

The folder that contains the “**technical logs**”

OnTheAir Video allows you to save the logs in a different folder (*If you have changed that preference, please make sure to look in the appropriate folder*). If you did not change the default location of those logs, you can access these logs as explained below.

There will be **one file created per day**, and these files are deleted automatically after one month.



If you need to report an issue using the “**Contact Softron Support**” menu, our team will often need to access the technical and system logs. So make sure the option “**Attach Logs Automatically**” is enabled. To find more information, [go to our website](#). You can also retrieve manually the logs, to do so, find [all the steps in our website article](#).

### As-Run Logs Folder:

**Not available in OnTheAir Video Express.**

OnTheAir Video can generate “**As-run logs**” that can be used to know which clips have been broadcasted, and when As-run-logs are saved in the folder selected in “Settings > General > As-Run Logs Folder”.

Once properly configured, OnTheAir Video will create one Log file every day. Each Log file will be named as this:

*OnTheAir Video Log 2024-02-28.txt*

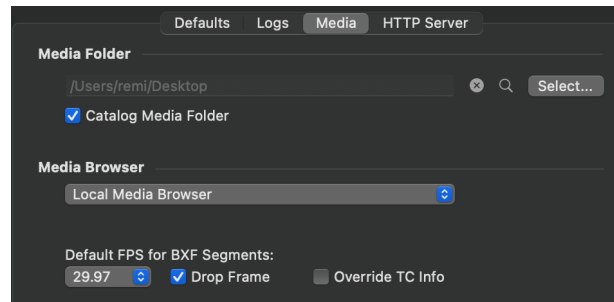
The Log file generated is a tab-separated file that can be analyzed using the free application “LogAnalyzer” that you can [download from our website](#) or it can also be analyzed by any other traffic system.

To understand how to analyze As-Run Logs, [go to our website article](#).



# OnTheAir Video User Manual

## 3.1.3. Media



### Media Folder:

A Media Folder is kind of a watch folder for OnTheAir Video where it finds the media that it has to play. Once you indicate such a Media Folder for OnTheAir Video, it scans the location that you indicated and shows the list of media available to your application.

### Media Browser:

Not available in OnTheAir Video Express

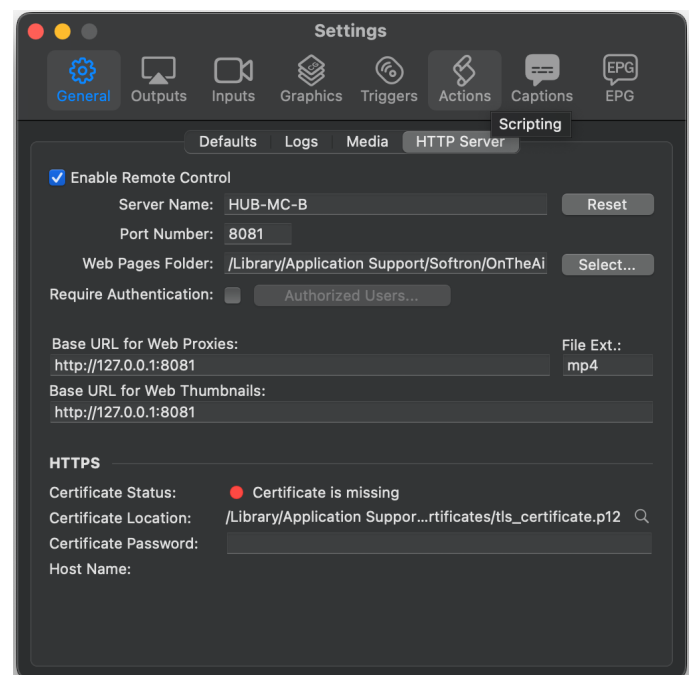
Add support for a local or remote media browser. [To learn more about the Remote Pack of OnTheAir Video, go to chapter "Remote Control".](#)

## 3.1.4. HTTP Server

Not available in OnTheAir Video Express.

If the Remote Control is Enabled, you can change the options :

- **Server Name:** the name that will be displayed when you try to connect to it
- **Port Number:** the port number that will be used to communicate with it. Depending on your FireWall configuration, you may want to change that, but otherwise leave it to the default value (8080)
- **Web Pages Folder:** If you have created one or several web pages to interact with MovieRecorder, you can select the folder containing those pages and it will be hosted by MovieRecorder. If I had a page called "Custom.html" in a folder selected, it could be reached at `127.0.0.1:8080/Custom.html`
- **Require Authentication:** Where you can choose the users that have access to your OnTheAir Video. You can add/Remove them and also set a password.





# OnTheAir Video User Manual

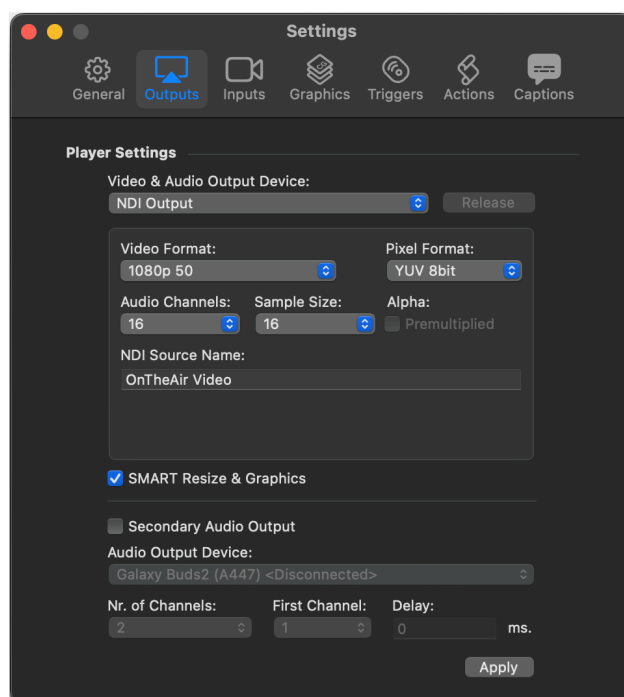
## 3.2. Outputs

Clicking this opens the Outputs panel, which allows you to set up your Player Settings. Any changes made to the Outputs settings must be saved by clicking the Apply button on the bottom right corner of the panel.

Select the device that will be used as the main video and audio output. A reminder that OTAV supports AJA, Blackmagic-Design and Deltacast cards and Thunderbolt devices, as well as NDI.

Different options are included (available options depend on the video device used):

- **Video & Audio Output Device:** This allows you to select any available video outputs to play and/ or record your playlist.
- **Video Format:** From here you may select the format you would like to play out your clips. The list is quite extensive (60 different formats), ranging from SD to 4k.
- **Pixel Format:** You may choose either YUV 8 bits, YUV 10 bits or ARGB as your Pixel Format.
- **Audio Channels:** You may select 1, 2, 8, 16, 32 or 64 audio channels.
- **Sample Size:** Your Sample Size may be either 16 or 32 bits per package.



Below that is the option to Enable **SMART Resize and Graphics**. When the box is checked, OnTheAir Video will automatically resize interlaced videos, and it will allow you to overlay logos and transitions. Note that this option will use more processing power from your graphics card. The Release button allows other users to utilize the graphics card even as you use OnTheAir Video. [More information in chapter "Graphics"](#).

You can also set a **Secondary Audio Output**.

**Not available in OnTheAir Video Express.**

In addition the video output on the selected video device, you can now also output to another available audio output on your Mac. Works with CoreAudio, so supports the audio devices that are available for macOS (including Dante or MADI).

For this device, you can also select the number of audio channels.



# OnTheAir Video User Manual

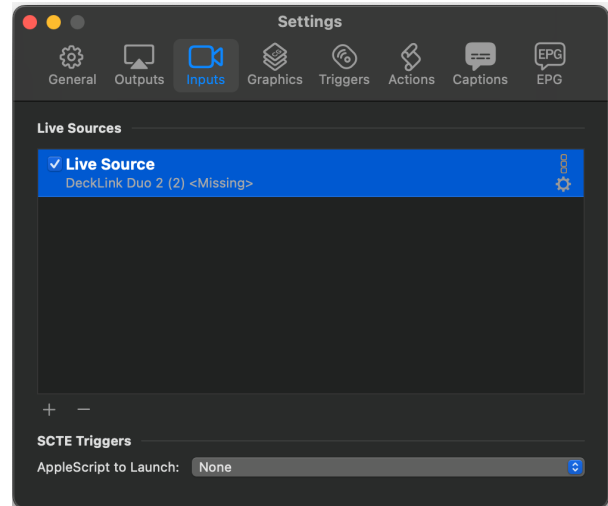
## 3.3. Inputs or “Live Sources”

Not available in OnTheAir Video Express.

In the inputs settings, you can handle your “Live sources”.

A Live Source allows you to select an incoming video signal and output it instead of playing back a clip.

For that you will need an additional video input. This can be on the same device that you use for output [if it supports it](#), or it can be a different video device. Note that you can use more than one additional input and you will thus be able to switch from one to the other. You will want to make sure that these sources are genlocked for a better result.



Once you have made sure that you have an additional video input, click on the “+” icon to create a new Live Source. When you create it, you can set:

- **Live Source Name:** what will be displayed in the menu when you will create the Live item in the playlist.
- **Video Device Input:** select the Video Device to use, and below that you set the other settings, such as Mute Audio or Level +20B. With Varying Frame Rate, you can use a different frame rate. We will duplicate or drop frames to maintain sync, and if it is a different size, we will scale it to match the output resolution. You can also choose to process SCTE triggers that are embedded.

You can create multiple Live Sources.

### 3.3.1. Add Live Clips to a Playlist

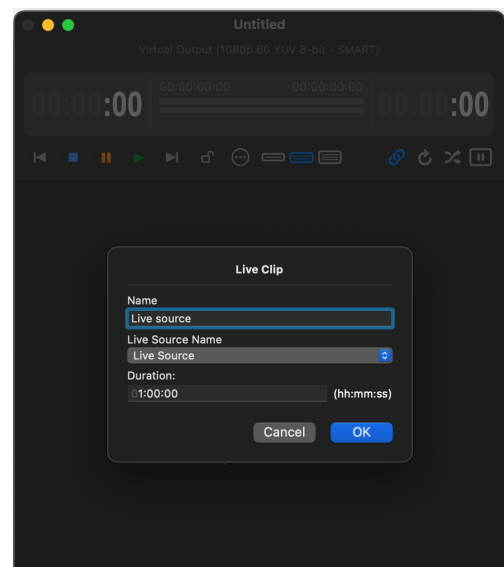
To add a Live Clip to a playlist you can:

- Go to the menu "File > Add Live Clip..."
- Use the keyboard shortcut “alt + ⌘ + I”

A window will pop up where you can set:

- A **Name** for your Live Clip.
- **Live Source Name:** the source you want to use
- **Duration:** the duration of your Live.

Note that a "Live Clip" behaves the same way as a regular video clip. If you need more information about Live Sources, go [to our website article](#).

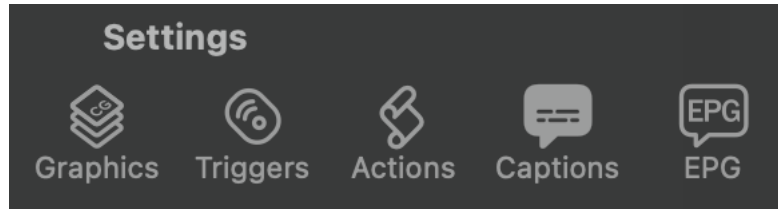




# OnTheAir Video User Manual

## 3.4. The Other Settings

In the settings menu, there are also five other tabs (*Triggers* is not available with OnTheAir Video Express):



They are linked with important features in OnTheAir Video. The explanations can be found in later chapters :

- Graphics: In chapter [“Graphics”](#)
- Triggers: In chapter [“External Controls and Integration”](#)
- Actions: In chapter [“External Controls and Integration”](#)
- Captions: In chapter [“Closed Captioning”](#)
- EPG: In chapter [“EPG option”](#)



# OnTheAir Video User Manual

## 4. Clip Inspector

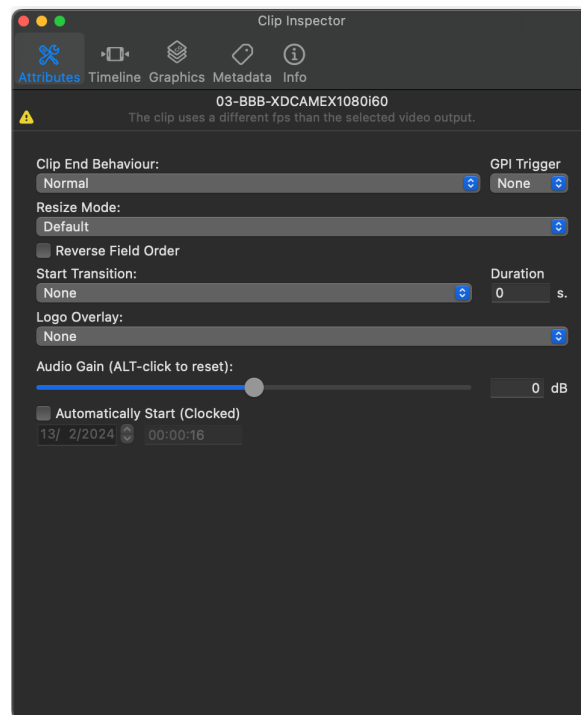
By highlighting a clip on your playlist and opening Clip Inspector, you open some useful functions and information available for that clip. To open the Clip Inspector:

- Go to the top menu “Window > Clip Inspector”
- Or use “command + i”

There are five tabs within the Clip Inspector: Attributes, Timeline, Graphics, Metadata, and Info.

### 4.1. Attributes

This panel reveals important information about the clip in play, and allows you to change some of its attributes.



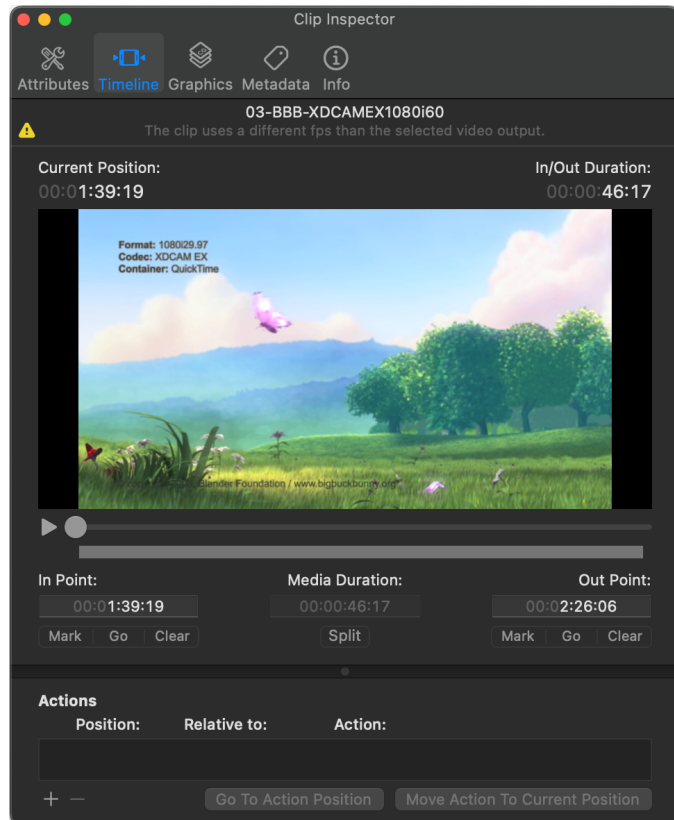
- At the top of the panel will be shown the **Title** of the clip.
- **The Clip End Behaviour:** the default is Normal, and the clip will end as per the indicated in the playlist's Options. The behavior may be modified to any of the following options: Stop at End, Hold Last Frame, Play Next Clip, and Loop.
- **GPI Trigger:** Set a GPI input to monitor that will do a skip next.
- **The Resize Mode:** your options are Fill, Pan & Scan, and Letterbox. Below that is a box that, if checked, **Reverses the Field Order**.
- **Start Transition:** Choose a transition to put on the start of the clip.
- **The Logo Overlay:** choose the static graphic you want to use. [Explained in chapter "Graphics"](#).
- Below that is a sliding bar with which you may adjust the clip's **Audio Gain**. You may also automatically start the clip at the time desired.



# OnTheAir Video User Manual

## 4.2. Timeline

The next tab is the Timeline Tab, which will show a large still shot of the playing clip.



- **The current position:** You can move forward or backward in the clip via a sliding bar beneath the still; you may also hit the play button to play the clip. Above and to the right of the still is the total duration of the clip.
- **In Point:** wherein the starting point of the clip is indicated (typically 00:00:00 unless modified).
- **Media Duration:** showing the duration of the clip.
- **Out Point:** showing at what point in the clip the video ends (typically the time of the last frame of the clip, unless modified). The In-Point and Out-Point time clocks can be modified, thus changing the starting time within the clip and/ or the ending time within the clip; when either of these attributes is changed, the Media Duration changes to match the current duration of the clip.
- **Mark, Go, and Clear:** *Mark* saves the In/ Out Point, *Go* sends the clip to the position of the In/ Out Point, and *Clear* resets the In/ Out Points to the original times.
- **Actions:** within which you may set up (or remove) secondary events within the clip, at a specified time within the clip.





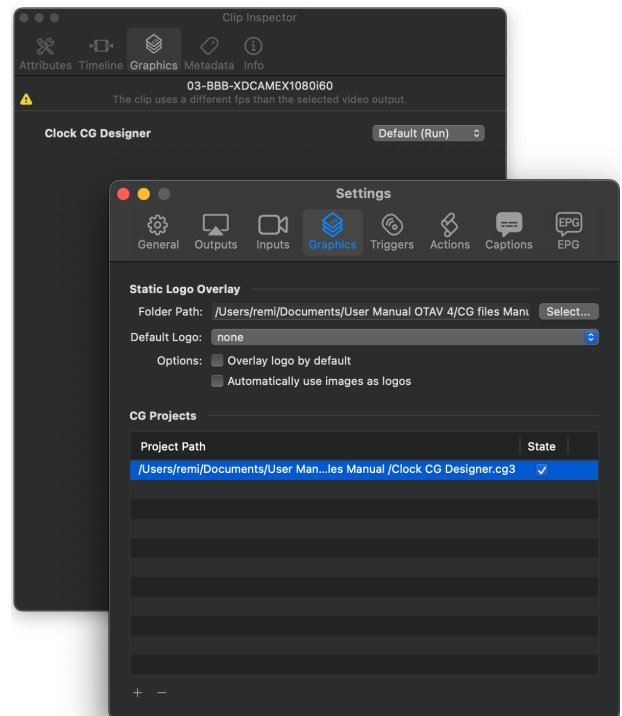
# OnTheAir Video User Manual

## 4.3. Graphics

The graphics tab allows you to add and control graphics on the clip selected. It uses the clip inspector and also the settings window, with a path to your Character Generator (CG) projects.

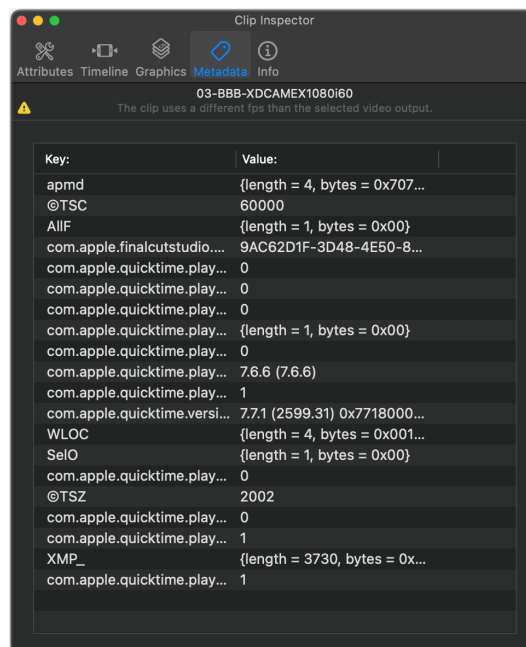
To create CG with OnTheAir Video, you can use [our free software: OnTheAir CG Designer](#). Available on our website.

We won't go further in how to set up Graphics. Everything is explained in the [chapter "Graphics"](#).



## 4.4. Metadata

The Metadata tab shows some metadata inherent to the clip.



## 4.5. Info

The Info tab shows some important information about the clip, such as its source, size, format, and so on.



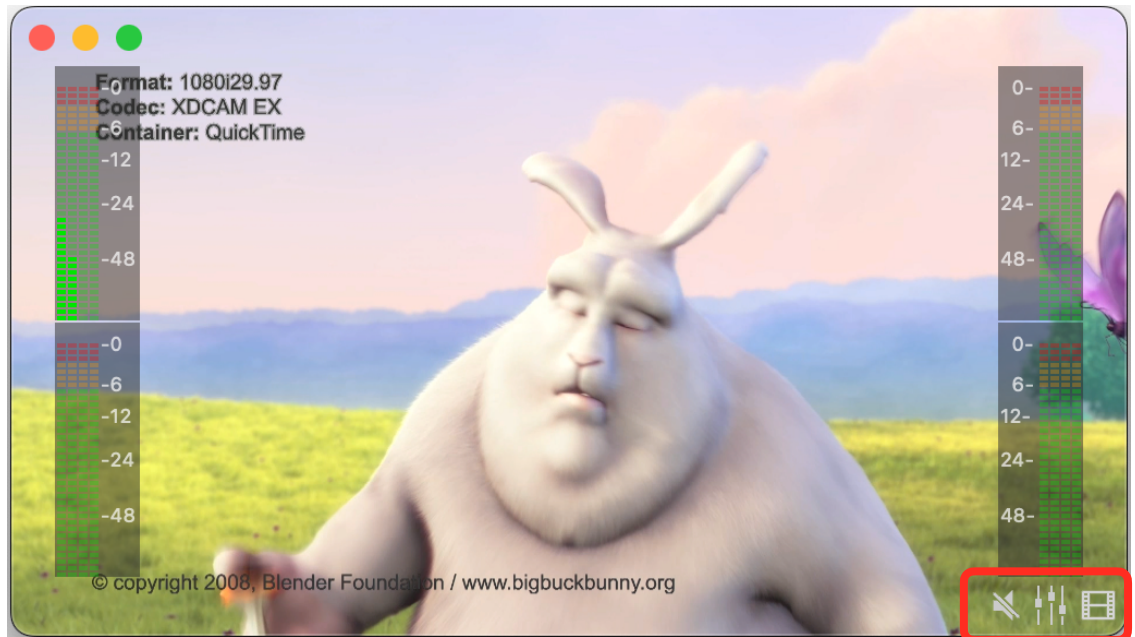
# OnTheAir Video User Manual

## 5. Output Preview

Reminder to open the output preview window:

- Selecting the menu “Window > Output Preview”
- Using the keyboard shortcut “command + ⌥ + p”

An example of a clip playing in a virtual output, that you can see in the output preview :



At the bottom of the window, you can see three buttons that allow you to change some settings:

### 5.1. Mute

The first “Speaker” icon allows you to Mute/Unmute the audio preview.

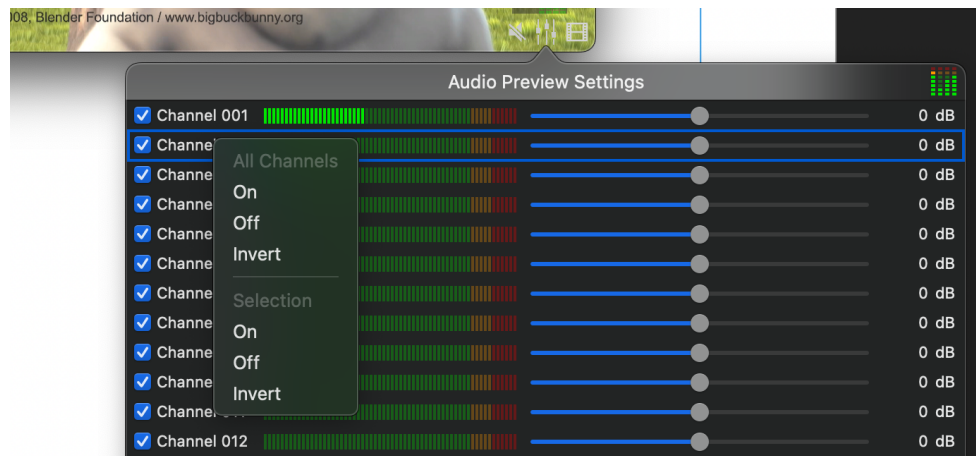
### 5.2. Audio Channels

The second icon allows you to set audio settings for the preview. Note that these settings do not change anything in the audio that goes out your video device, it only changes for the audio preview. To change the gain on a clip, go in “Inspector > Attributes”. To change the number of channels that are displayed in the VUMeters and in the mapping window, change the number of audio channels in “OnTheAir Video > Settings > Outputs > Player Settings > Audio Channels”.



# OnTheAir Video User Manual

Here's the window for the audio preview settings:

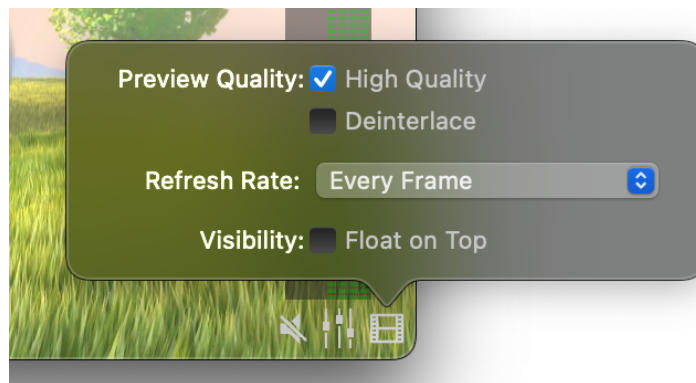


To enable/Disable an audio channel, tick the checkboxes, or right-click on them to enable/disable multiple channels at once. You can either perform the action on all channels, or only on the selected ones. To select some channels, click on the VU meter section.

To change the gain of each channel, use the slider, or manually enter a value in the field.

## 5.3. Video

In this window, you can set the video preview quality and refresh rate. Note that in some cases (such as if you do [remote control](#)), it may be important to lower the refresh rate so you don't use too much resources of your computer.



You can also set that the Output Preview window always remains on top of all windows by enabling the **Float on Top** option.



# OnTheAir Video User Manual

## 6. Scheduler

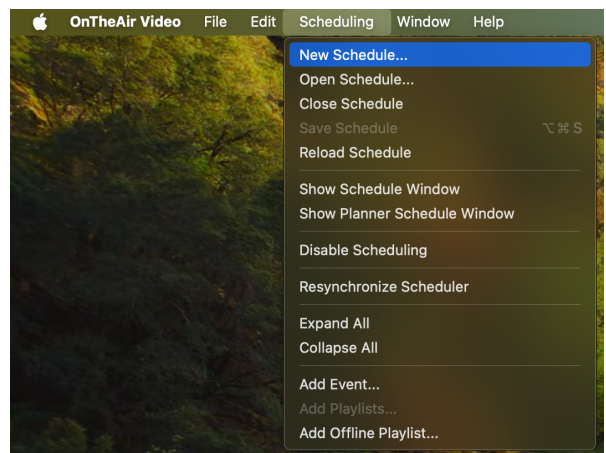
Not available in OnTheAir Video Express.

You can schedule playlists to be played automatically at given times. OnTheAir Video can play 24/7 for days and days without you having to worry about it, a feature that is used a lot by TV stations as their main automation software.

### 6.1. Create a Schedule

First, you have to open the output preview window:

- Selecting the menu “Scheduling > New Planner Schedule... > Save as ... .xml”
- You can also open a **pre-existing Schedule, close, save or reload** the one you are using.
- Two windows are available: **the Schedule and the Planner Schedule**. The differences are explained in this chapter.
- **Enable/Disable Scheduling** to start or stop playing the clips in your schedule.
- **Resynchronize Scheduler** to start playing the clip planned at this time.
- You can **add event, playlists and offline playlist**.

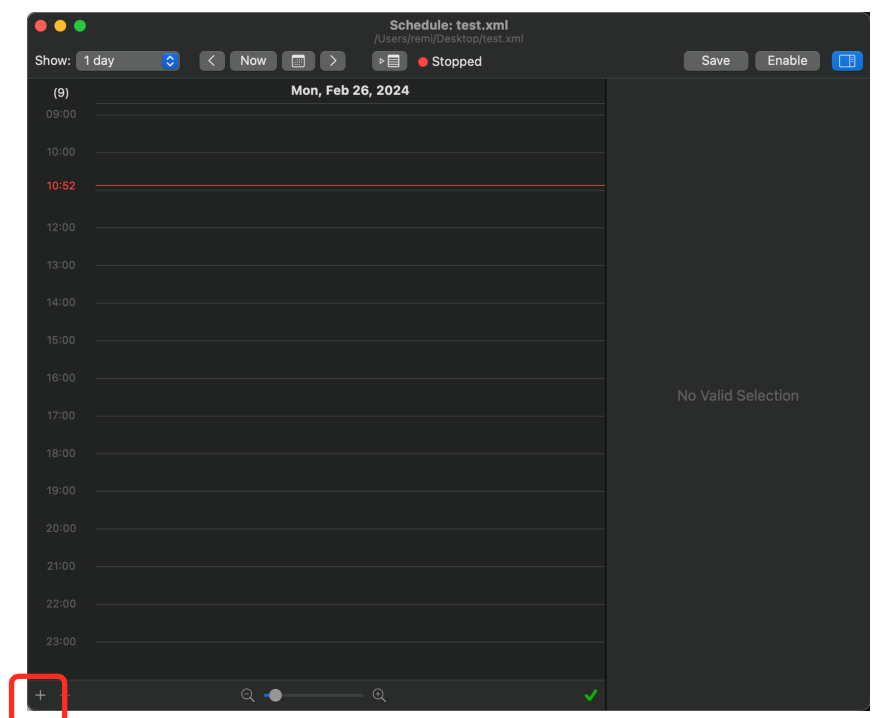


Once the new Planner schedule is open, you will see this window :

This is a blank schedule. Now you need to create an event, in which we will add a playlist, a folder-based playlist or an offline playlist (you can enter or drag multiple playlists at the same time).

But first, to create an event:

Go to the bottom left of the window and press the “+” option.



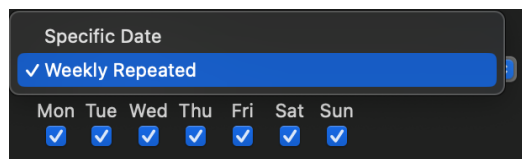


# OnTheAir Video User Manual

When you create an event, a new window will appear:

Here you can rename your event and choose between two very important options:

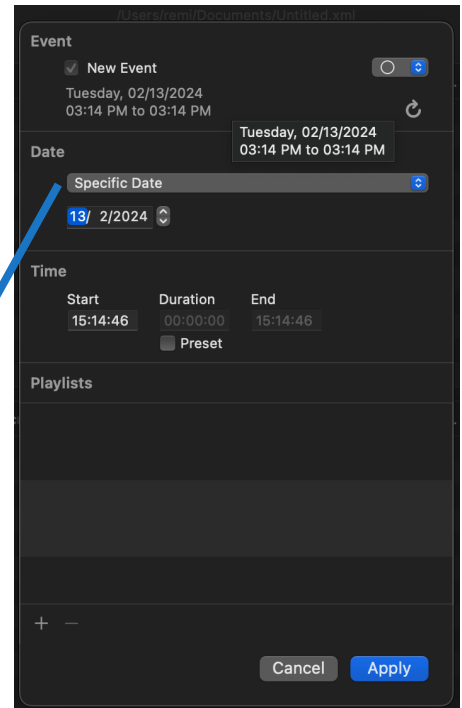
- **Specific Date:** Your event will only be played at a special day and at a special time.
- **Weekly Repeated:** You can have daily, weekly, weekdays and weekend events. Choose and set up that event and it will keep occurring on the days you have indicated.



In either case, you then set a start and an end time, so that you can determine the duration of your event.



If two events occur at the same hour and at the same day, the one set at a Specific Date will take priority to the other. At the end of the one-time event, it will not automatically cut over to the Weekly Repeated event, so make sure to respect the same duration.



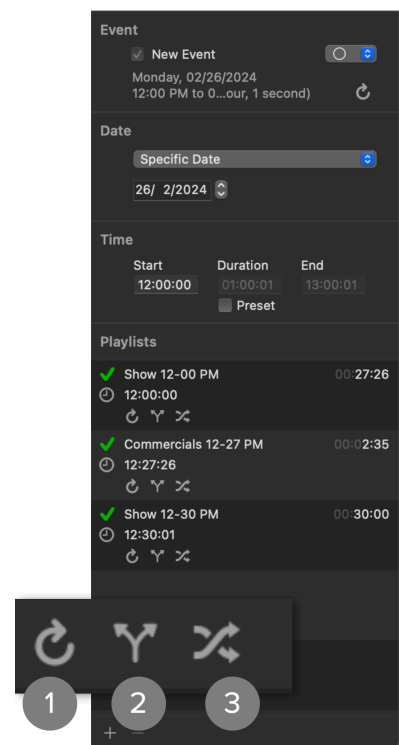
In this window, you can already add playlists with the "+". You can also remove playlists with the "-". These options are also available in the main window we saw before.

## 6.2. Playlists in Scheduler

You can add one long playlist in your event, multiple playlists or folder-based playlists. There are many ways to set up your events. Here is an example of a 1-hour show, made up of three playlists, and visible in the scheduler:

Three settings are available for your playlists:

- 1 **Loop:** When this box is enabled, the playlist will be in Loop mode. It causes the clips to replay after it finishes playing.
- 2 **Cue:** When this box is enabled, the playlist will be in Cue mode. The clips will stop on the last frame.
- 3 **Randomize:** Makes a random mix with all the clips inside the playlist. It allows you to play it multiple times, with the same clips, but with a unique sequence every time.





# OnTheAir Video User Manual

## 6.2.1. Playlist Duration

As we saw in [Chapter 2. The Playlist](#), if you add live clips in your playlist (for live events), you won't be able to know the exact length of your event, and your playlists may not reach the expected duration of your event.

Let us use the same example as before, but one of the playlists is too short. You can see a timing issue in the *Difference panel* and an exclamation mark next to the event:

New Event		Time	
12:00:00	Show 12-00 PM	Start	Duration
...		12:00:00	01:00:01
12:59:39	END		<input checked="" type="checkbox"/> Preset
New Event		End	-00:00:22

For this 1-hour show, it means there are 22 seconds missing. The timing isn't correct anymore. An easy way to fix this issue is to create billboards: Add a playlist at the end of your event (with commercials or a station identifier, for example) and select the **Loop** Option. It will keep something going until the start time of a new event.



When you enable your schedule in OnTheAir Video, it will automatically play the clip scheduled at this very moment.

## 6.2.2. Offline Playlist

The offline playlist is created when you are making OnTheAir Video playlists in third-party software (created or developed by a different company) or on a different computer with OnTheAir Video. An offline playlist is "empty" at first. Then the playlist is added through another computer or the third-party software.

In the example below, the 8pm show has been created with an offline playlist. It is already planned in the schedule, but the playlist is missing.

Schedule		Playlists
Show 09-00 AM		✗ Show 12-00 PM 00:27:04
Show 10-00 AM		⌚ 12:00:00
Show 11-00 AM		
Show 12-30 PM		

In this example, we use our Documents folder. When the 8PM show playlist is created and saved to that folder, it is automatically added to the event:

Schedule		Playlists
Show 10-00 AM		✓ Show 12-00 PM 00:27:04
Show 11-00 AM		⌚ 12:00:00
Show 12-00 PM		
Show 12-30 PM		



# OnTheAir Video User Manual

## 6.3. Organize the Schedule

Go to the top left of the window, where you will find different options to present the Schedule:



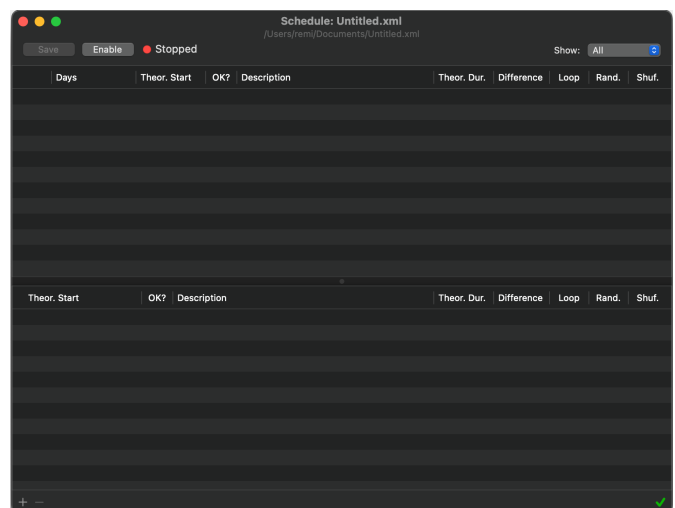
- **Show:** You can decide the numbers of days shown in the schedule. The first one on the list is today. You can make from 1 to 18 days visible in the Planner.
- **< or >:** Go to the day before or the day after.
- **Now:** Puts you in front of what is currently playing in the Schedule.
- **Calendar:** Choose the day you want to show in the Schedule.

## 6.4. The “Classic” Schedule Window (Version 4.0 or later)

First select the menu “Scheduling > Show Schedule Window”

This window offers the same features as the Planner Schedule Window, and it is the “traditional” Schedule window from OnTheAir Video.

If you are working 24/7 with the Planner Schedule, you will have a lot of events to deal with. It can become very difficult to understand what is going on in this schedule window. Specific Date events mixed with Weekly Repeated events won't help you visualize what is planned today, tomorrow or during the weekend.

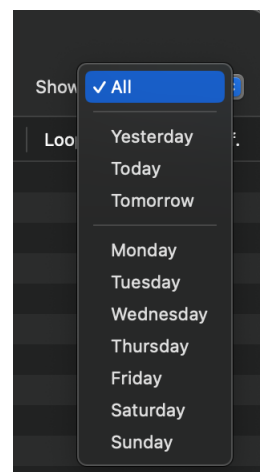


### 6.4.1. The Show Filter

To organize this Schedule, Open the Show Filter on to the top right corner of the Schedule Window. Click on “Show: All” and this window will pop up:

Here you can select only the day you care about. The scheduler will show you the events of the day you selected, in the correct running order.

If you need more information about the scheduler. Videos are also available in [our Youtube Page you can find with this link.](#)







# OnTheAir Video User Manual

## 7. Graphics

You can add dynamic graphics and static graphics to your clips and outputs. In this chapter, we will see what is the difference between static and dynamic graphics, how to create them and how to set these up in OnTheAir Video.

### 7.1. Static or Dynamic Graphics?

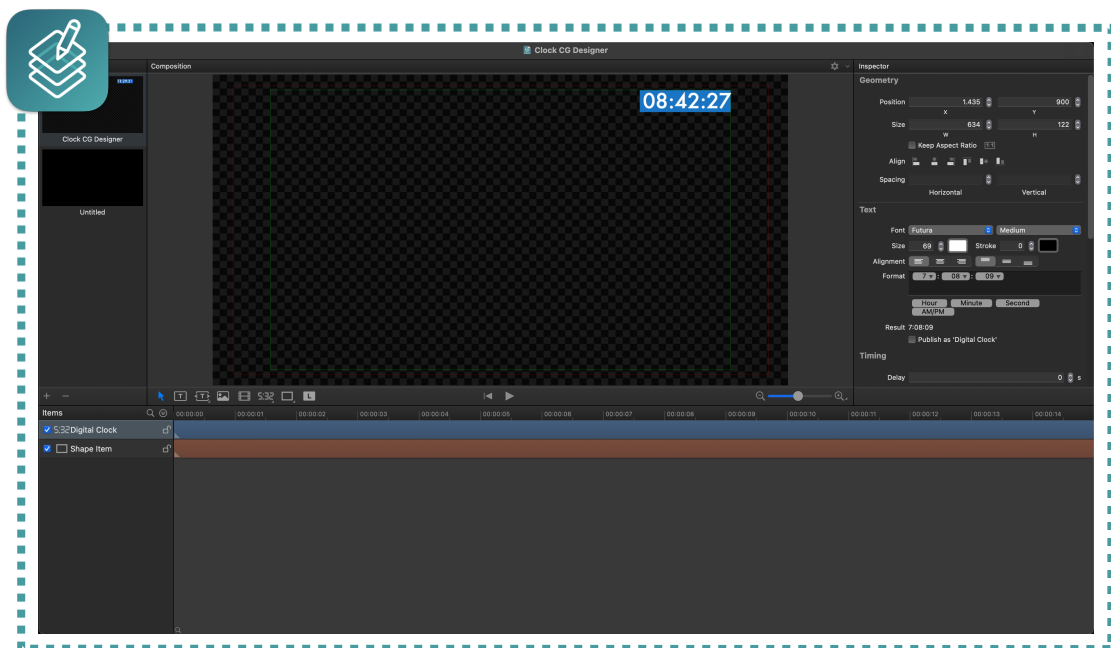
- **A static graphic** is a fixed image, such as a company or TV logo.
- **A dynamic graphic** goes further. It is an overlay that changes based on new information, context or user input. For example: a digital clock, a ticker, game stats, etc.



To use automated dynamic graphics directly in OnTheAir Video, you need the [Dynamic Graphic Overlay option](#). **Not available in OnTheAir Video Express.**

### 7.2. Create a Graphic with OnTheAir CG Designer

If you want to create a Dynamic/Static Graphic, you can download our free software: [OnTheAir CG Designer](#). More information available at [softtron.tv](#).



For each CG project, you can create any number of items — the only limitation will be what your computer can handle. You can add text (fixed or moving), shapes, still images, movies, clocks (digital or analog), or Live items. Each can be customized and positioned in the CG project very easily. Each item can then be "timed" in the timeline, set when it will "appear," and you can define animations such as fades, pushes, and moves.

To learn how to use OnTheAir CG Designer, see our [YouTube videos presentation](#).

More information [on our website](#).





# OnTheAir Video User Manual

## 7.3. Set Up your Static and Dynamic Graphics

First you need to go to the settings and enable a very important option:

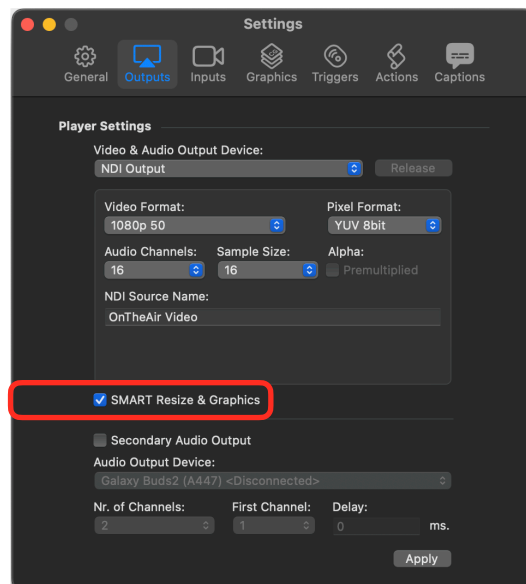
### 7.3.1. SMART Resize & Graphics

Go to the top menu “OnTheAir Video > Settings... > Outputs”

Make sure this option (surrounded by red in this picture) is enabled:

- You will be able to overlay graphics.
- The resize of interlaced material will be done with a much better quality.

But, also, when the option is enabled it will use the Graphics card much more, and thus you will need a decent Graphics card. So if you don't need to resize interlaced video, nor overlay graphics, we would recommend you leave the option disabled.

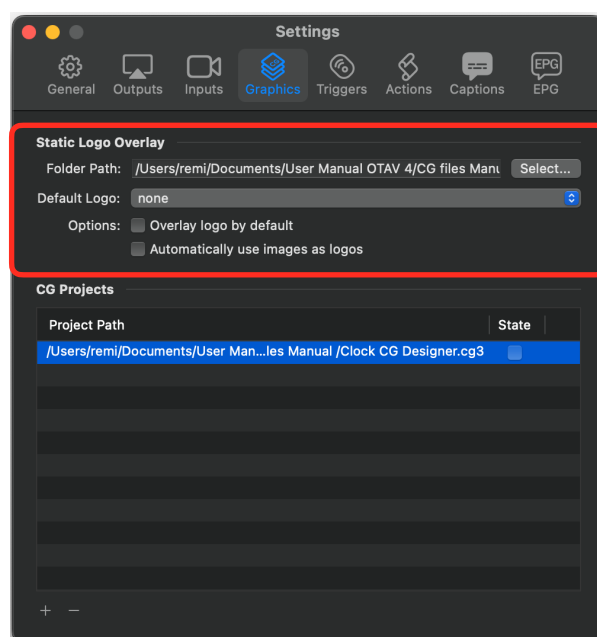


### 7.3.2. In the Settings

Now that the SMART resize & Graphics is enabled, we will set up a graphic and a logo for your output. For that, stay in the settings. Next to the Outputs, there is the Graphics Settings:

First, how to set up a **Static Graphic**:

- **Folder Path:** the path to the folder where you will place your logos.
- **Default Logo:** Once you have selected a folder with supported files, you will be able to select from amongst them the logo that will be used by default.
- **Overlay logo by default:** Sets whether or not the default logo will be overlaid on the clips you drag to a playlist. This option doesn't change playlists that were already created, it will simply turn on the logo overlay option on all clips that you drag and drop to a playlist after the option was enabled.
- **Automatically use images as logos:** When enabled, an image file with the same name as the video clip and located in the same folder will automatically be used as a logo for that clip. This is very convenient to overlay a specific graphics over a specific clip automatically, just enable this option and place in the same folder a movie and logo file with the same name.





# OnTheAir Video User Manual

Two recommendations with Static Graphics in OnTheAir Video:

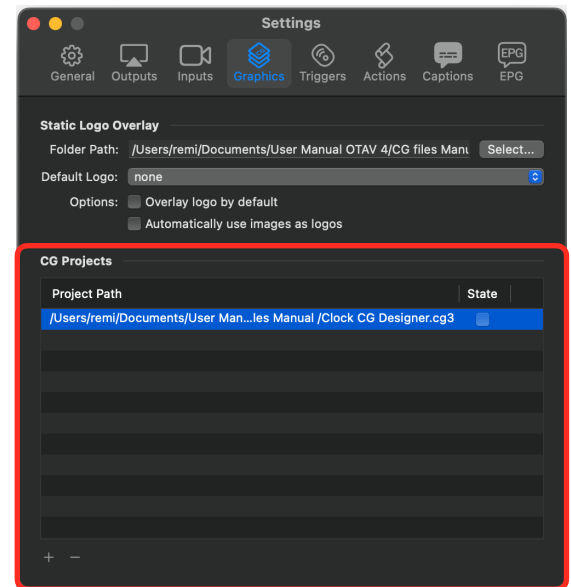
- **File type.** We recommend using .png files, but other formats are supported (tga, ...). Make sure it has an alpha channel, and test it before using it.
- **Size.** The logo file must be the same size as your playback output settings. You won't be able to change its location, so make sure to place the logo or graphics where you need it.

More [details in this article](#).

Now, how to set up a **Dynamic Graphic**:

**Not available in OnTheAir Video Express.**

- In the window “CG Projects”, you can add the graphics you created with OnTheAir CG Designer.
- Just press the “+” button in the bottom left.
- Then open your CG projects. Note that you can add multiple CG projects. They will be visible in the list.
- If you want to remove a CG project from the list. Just press the “-” button
- The default “**State**” of each project is disabled. Check the box to enable the CG projects to your OnTheAir Video.

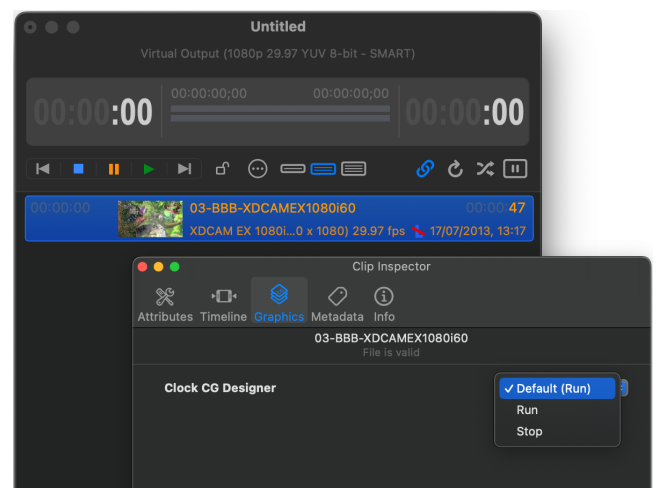


Note that you can use a **Sidecar file**. If your Graphic file has the same name as your Clip file, and is stored in the same folder, it will automatically be played on that clip. With this technique , you can set each clip with a different graphic. It only works with Static Graphics.

## 7.3.3. With the Clip Inspector

When you set up a graphic from the OnTheAir Video Settings, this graphic will appear on all the clips in the playlists. To set up a CG project on a single clip, use the Clip Inspector:

- First select the clip you want to set up. Then open the Clip Inspector go to the Top menu “Window > Clip Inspector”) and go to the Graphics.
- You will see the list of all the Graphics (CG project) you added in the Settings.
- Each Graphic is in “**Default**” mode. It means the Graphic will **Run/Stop** depending on what has been applied in the Settings.
- With the Clip Inspector, you can go further and decide if you want to enable (Run) or disable (Stop) each CG project on this clip only.



You can also control the project from actions; see more in Chapter: [External Controls and Integration](#).

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# OnTheAir Video User Manual

## 8. Transitions

Not available in OnTheAir Video Express.

Add transitions to bring even more to your playlist. You can use either built-in transitions, or custom transitions (made with your own movies with an Alpha Channel).

### 8.1. Set Up a Transition

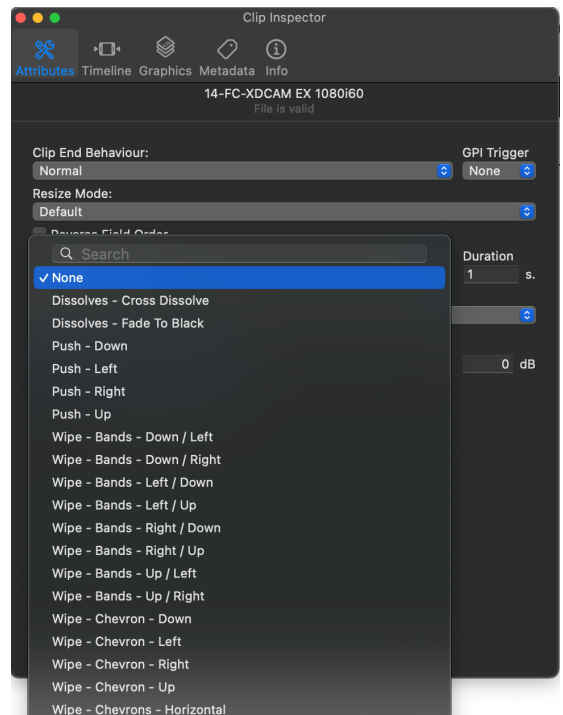
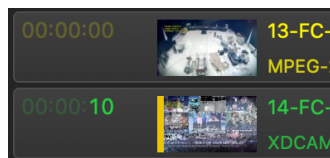
Select a clip in your playlist and open the Clip Inspector. (“Top menu > Window > Clip Inspector”). In the Attributes section, click on “Start Transition:”

There you have access to a large list of Built-in transitions:

- *Dissolves effects*
- *Push effects*
- *Wipe effects*
- *etc*

Click on the transition you want. It will be added to the clip. If there is another clip just before, the transition will be played between the two clips.

Note that in the playlist, the clip has a yellow bar to indicate there is a Start Transition.



The playlist will also update its length as it gives time feedback from the transitions.

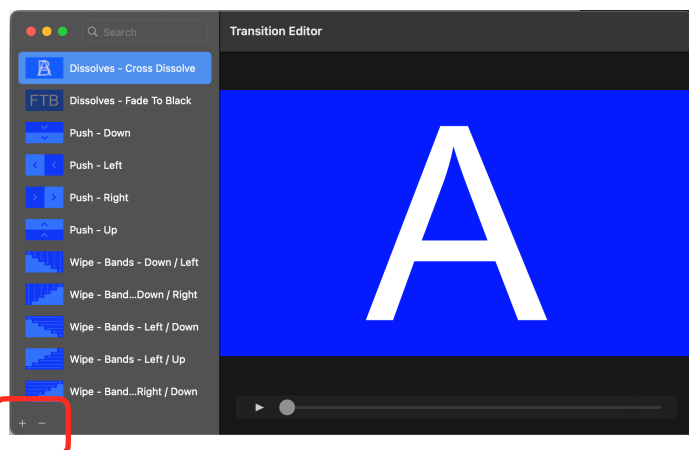
You can also create custom transitions using our Transition Editor. It will be automatically added to the list.

### 8.2. Transition Editor

To create a custom transition:

- Go to the top menu “Window > Transition Editor”
- Use the keyboard shortcut “command + shift + p ”

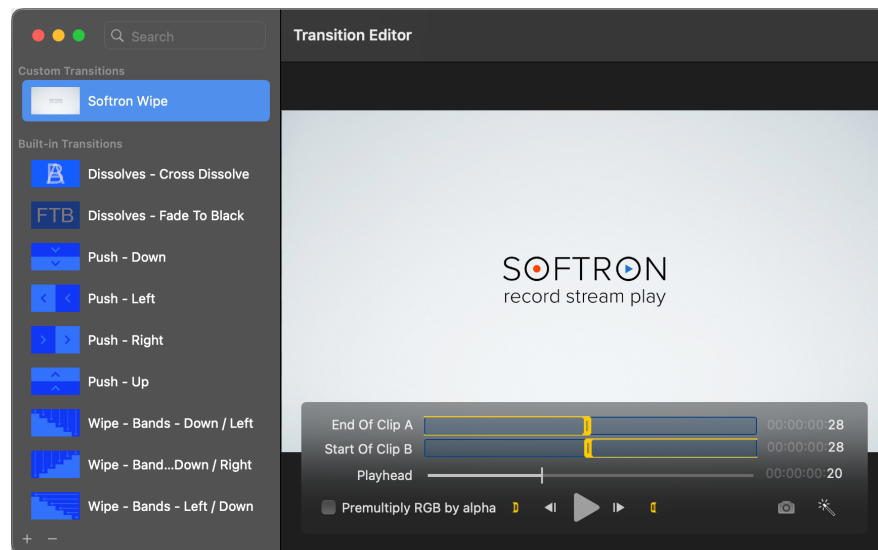
The Transition Editor window will open. There you can see the list of Built-in transitions. Now press on the “+” in the bottom left to add a custom project.





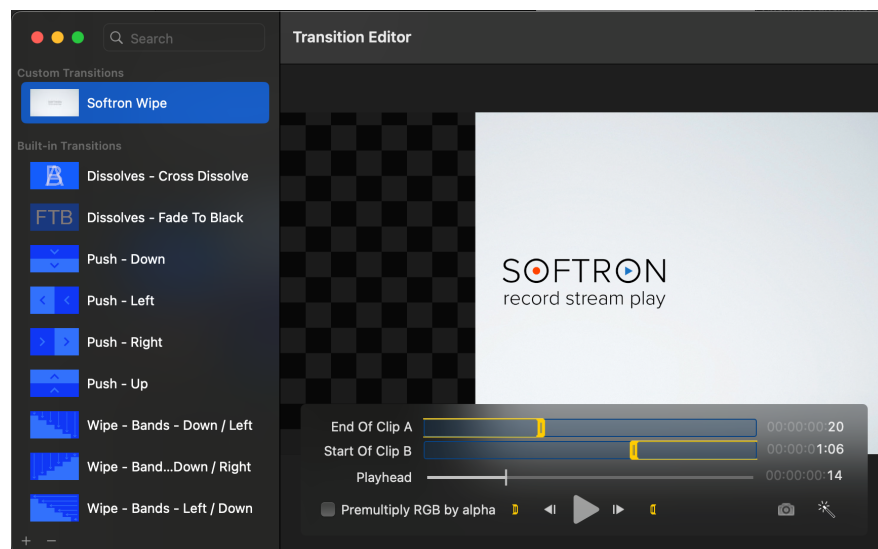
# OnTheAir Video User Manual

Now add your movie (made with Alpha Channel for example) to the Transition Editor. A new category is created: the Custom Transitions. Projects are visible in the window:



You can adjust the Playhead from the beginning and the end point manually. But you can also do it automatically by using the Magic Wand. ✨

The Magic Wand will determine the best position and time for your actual clips (A and B) and for the transition.



- **Premultiply RGB by alpha:** When enabled, it applies the transparency (alpha) to the color of the graphics. When disabled, the outputting is considered “straight”.
- **The camera** (next to the Magic Wand) can be used to determine the thumbnail of the transition.

To see a full tutorial about the Transition Editor, [go to our Youtube Channel](#).



# OnTheAir Video User Manual

## 9. Streaming Inputs in OnTheAir Video

Not available in OnTheAir Video Express.

Streaming inputs for OnTheAir Video simplify the playlist workflow. For the most up to date list of supported stream types in OnTheAir Video, visit our web page under: [Tech specs](#).

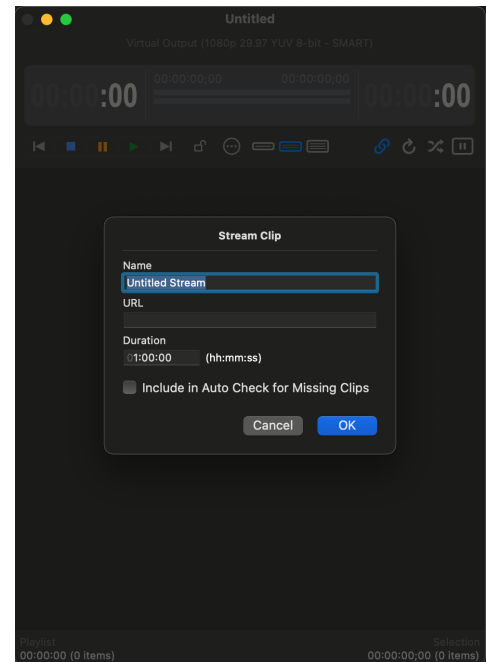
In OnTheAir Video, when your playlist is open. Click “File > Add >Stream Clip...”

In the new window:

- **Name:** Give the stream clip a title
- **URL:** The stream URL
- **Duration:** Set the duration of your clip
- You can choose to enable the **Include in Auto Check for Missing Clips** option: when enabled, the playlist will check for missing clips every 10 seconds. If your stream is reliable, we advise not to enable this option, as it uses more computer resources.

For your testing, here is a website where you can find public streaming videos:

<https://www.cotrip.org/home>



Once you have saved that address, OnTheAir Video will validate the address and it will be ready to play. You can preview the clip in clip inspector like any other clip.



# OnTheAir Video User Manual

## 10. Closed Captioning

Not available in OnTheAir Video Express.

To use this feature, you need [the Closed Captioning \(CC\) option for OnTheAir Video](#).

This paid option enables the output (in the SDI output) of Closed Captioning, Subtitle (OP47) and VANC data, such as SCTE35.

### 10.1. Requirements

To output Closed Captioning or OP47, you will need:

- A valid [license of OnTheAir Video 4](#), plus the [CC option](#).
- A video device that supports outputting VANCs (all recent cards that we support and that have an SDI output should work fine, but older models of Blackmagic devices may not support it). For AJA cards, you need to enable VANCs in the AJA Control Panel.

Note that we write the CC or OP47 info in the VANC of an SDI output, so this will only work with an SDI output. When using the direct link (for example, to send video from one of our playout application to another), the CC or OP47 are preserved, as well.

### 10.2. Supported Types

Type	CEA608/708	OP47
Embedded in a QuickTime media file	Supports a QuickTime Closed Captioning track, in CEA608 or CEA708.	Not supported.
Embedded in a MXF media file	Supports a Closed Captioning track in CEA708	VANC packets with DID 0x43/SDID 0x02
Sidecar file	Supports SRT files*. Output in SDI VANC is 608 packaged into 708, not full 708. So formatting and languages will be limited.	Supports SRT and STL file*

\* To know more about how to format SRT files, go to our [website article](#).

#### 10.2.1. Formatting the SRT File

As explained above, for OnTheAir Video to use a sidecar SRT file, it must be placed in the same folder as the video file, and bear the same name, with the .srt extension.

A SRT file is easy to create as it's basically a text file, with timing information. An example:

```
1
00:00:00,980 --> 00:00:03,020
Hello World!

2
00:00:03,610 --> 00:00:06,017
That's a beauty!
```



# OnTheAir Video User Manual

There is one strict limitation. The length of the line must be of maximum 34 characters, so if you need to align your text on the right, you must format it this way:

```
1
00:00:18,220 --> 00:00:20,360
                        Hello World
                        Aligned to the right
```

You can add a few formatting options, such as the color:

```
1
00:00:00,980 --> 00:00:03,020
<font color="FFFF00">Hello World</font>
```

Here are the supported colors and their corresponding codes:

White: FFFFFFFF	Yellow: FFFF00	Cyan: 00FFFF
Red: FF0000	Blue: 0000FF	
Green: 00FF00	Purple: FF00FF	

And you can use the "{\anX}" tag at the beginning of a line to define the position of the subtitling, where you replace the "X" by a digit from 1 to 9 corresponding to the position of the touches on a numeric keypad. (so for example 1 = Bottom Left, 9 = Top Right, etc...):

```
1
00:00:00,980 --> 00:00:03,020
{\an9}Shown at the top right
```

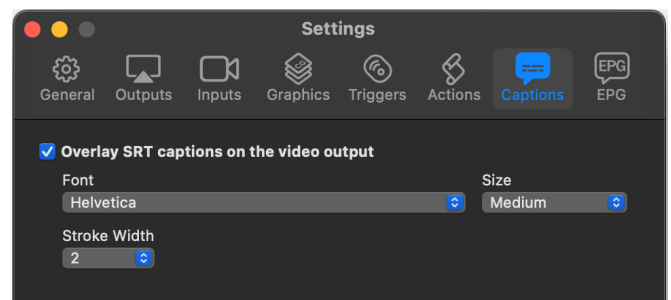
And here are the positions and their corresponding tags:

Bottom Left: {\an1}	Middle Right: {\an6}
Bottom Center: {\an2}	Top Left: {\an7}
Bottom Right: {\an3}	Top Center: {\an8}
Middle Left: {\an4}	Top Right: {\an9}
Middle Center: {\an5}	

## 10.2.2. Burn an SRT file in your Playout

If your clip has an SRT file as a sidecar (the two files have the same names in the same folder), you can overlay (burn the captions) on the video output. To do that, go the top menu "OnTheAir Video > Settings > Captions".

You can also set the Font, the size of your Captions and the size of the Stroke Width.





## 10.3. Supported Characters

In the "NTSC world" (formats using 29.97fps and 30fps), when we output subtitles to SDI, we format it as CEA-608 packaged into CEA-708. This means that not all characters will be supported. When creating your subtitle make sure not to use any special characters. In any case, it is best to test with our free demo version and see if the characters that you want to use are supported. Here's a non-exhaustive list of characters that should be supported:

Alphanumeric Characters	Basic Punctuation	Special Characters
Capital letters (A-Z)	Period (.)	Ampersand (&)
Lowercase letters (a-z)	Comma (,)	Pound/Hash (#)
Numbers (0-9)	Question mark (?)	At symbol (@)
	Exclamation mark (!)	Dollar sign (\$)
	Hyphen (-)	Percent (%)
	Apostrophe (')	Asterisk (*)
		Plus (+)
		Equal (=)
		Semi-colon (;)
		Colon (:)
		Double Quote (")
		Left and right parentheses ( )
		Forward slash (/)
		Backslash (\)

**Characters Specific to languages:** All French and Spanish characters should be supported. Other languages are not, but this may change, so don't hesitate to run a quick test with our free demo versions to confirm.

## 10.4. Creating Files

You can embed CC tracks in QuickTime or MXF files. There are multiple ways to do this. Editing software become more and more capable over the years. We have an [article that explains the different workflows for closed Captioning](#) (not for OP47).

The options to create OP47 are more scarce. You can only embed OP47 in MXF files, not in QuickTime .mov files. But most editing software can export an SRT file that we can then read. So out of all the possibilities, the SRT file is what seems the most flexible, as many software applications support it, it can be uploaded to YouTube or other streaming platforms, and it is easy to edit. But of course you will need to make sure that it always travels with the file.





# OnTheAir Video User Manual

## 11. Remote Control

Not available in OnTheAir Video Express.

Remote control is possible with the demo version but not with the Media Browser remote (no cataloging in DEMO mode)

To use this feature, you need [the Remote Pack option for OnTheAir Video](#) or the [Traffic option for OnTheAir Video](#).

The Remote Pack Option for OnTheAir Video enables the Remote Control of one or more OnTheAir Video instances over the network either via a simple web browser or via another unlicensed OnTheAir Video. It also adds a convenient Media Browser to allow you to add media to your playlist remotely.

### 11.1. Set Up the Playout Channel

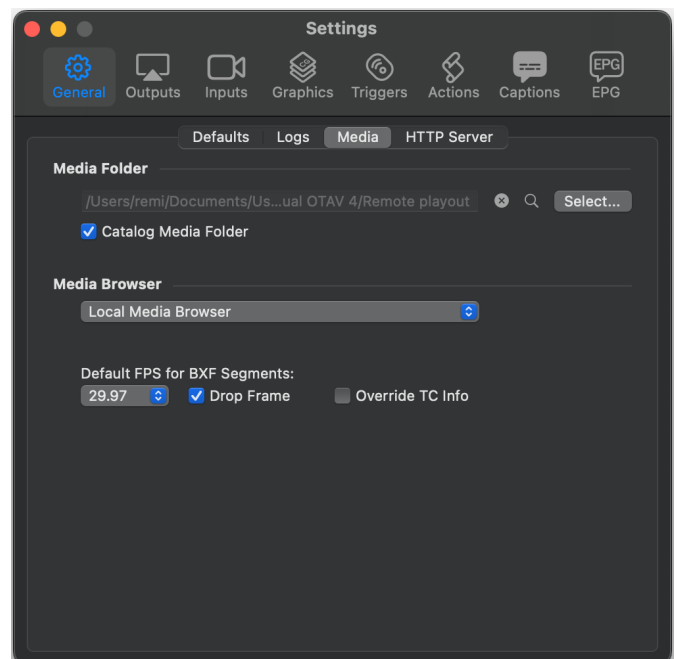
The playout is the OnTheAir Video where the Remote Pack option has been applied. On this computer, go to the top menu “OnTheAir Video > Settings > General > Media”.

First, set your Media Folder:

- **Media Folder:** This is a watch folder for OnTheAir Video where it finds the media to play. Once you indicate a Media Folder to OnTheAir Video, it scans the locations that you indicated and shows the list of media available to your application.

Now, enable the Catalog Media Folder:

- **Catalog Media Folder:** It will catalog and validate content from the Media Folder. It is essential if you want to use the Remote or the Traffic option.
- **Media Browser:** An OnTheAir Video window that allows you to read content from a local or a remote Media Folder. More explanation follows in [the chapter “Traffic option”](#)
- You can also set the default FPS (Frame Rate) for BXF segments to 29.97 or 59.94. BXF (Broadcast eXchange Format) allows the interchange of data and metadata among professional systems. In OnTheAir Video it allows you to automatically create segments in the Media Browser.
- You can choose to enable/disable the Drop Frame and to Override TC Info.



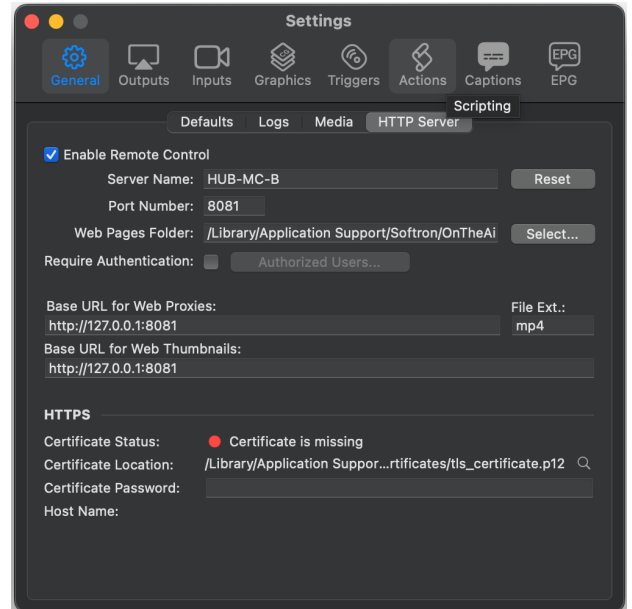


# OnTheAir Video User Manual

Now that you set the Media Folder and you enabled the Catalog Media Folder option, stay in the General Settings and go to the HTTP Server:

Make sure to enable Remote Control, and you can change the options:

- **Server Name:** the name that will be displayed when you try to connect to it
- **Port Number:** the port number that will be used to communicate with it. Depending on your FireWall configuration, you may want to change that, but otherwise leave it to the default value (8081)
- **Web Pages Folder:** If you have created one or several web pages to interact with OnTheAir Video, you can select the folder containing those pages and it will be hosted by the application. For instance, a page called "Custom.html" in a folder selected could be reached at *127.0.0.1:8080/Custom.html*
- **Require Authentication:** Where you can choose the users that have access to your OnTheAir Video.... You can add/remove them and also set a password.



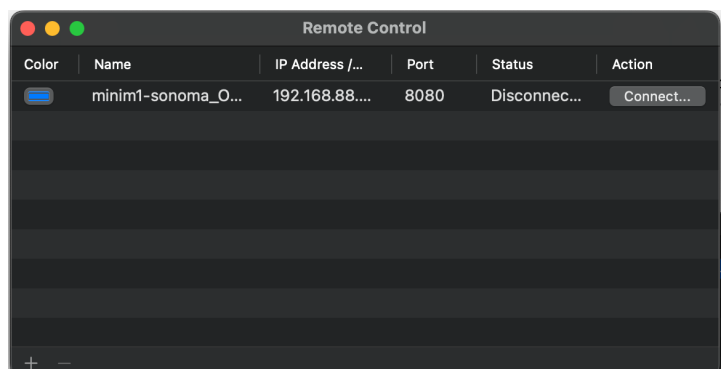
## 11.2. Remote Client

The Remote client can be a simple web browser or another OnTheAir Video, even unlicensed. In this next example, we are working on a different computer and we will remote control the OnTheAir Video instance we [just set up](#).

First, go to the top menu "OnTheAir Video > Remote Control..."

This window will appear:

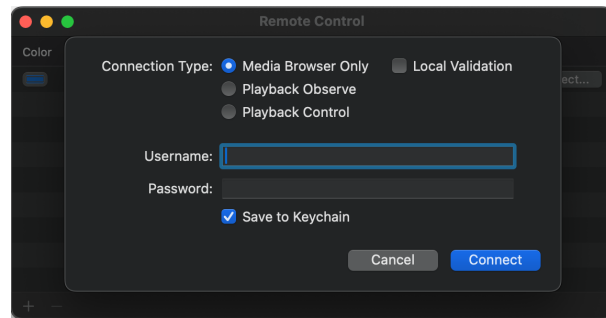
- Click "+" to add the playlist channel to your list.
- You can then assign a color.
- Click on Connect...





# OnTheAir Video User Manual

When you are connecting to the playout channel, this window will pop up:



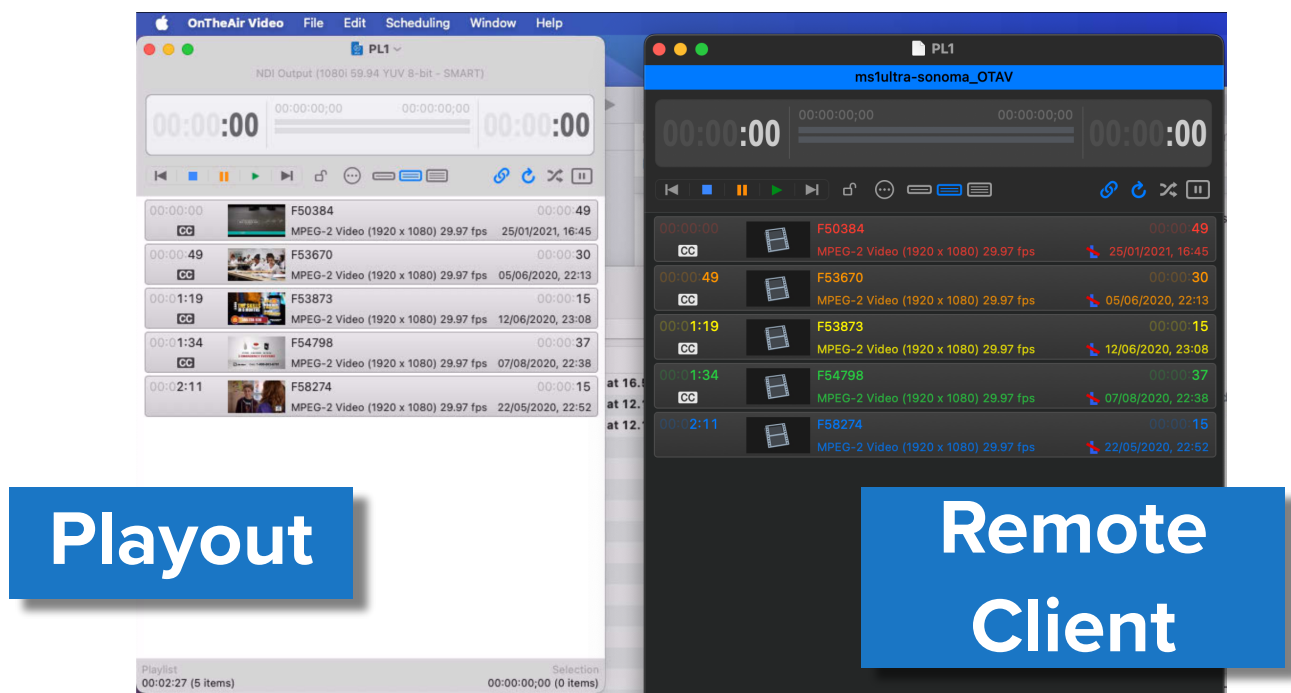
If **Require Authentication** was enabled by the playout channel, enter your Username and your Password. You can Save this to Keychain.

There are three Connection Types that determine the limits of your access to OnTheAir Video:

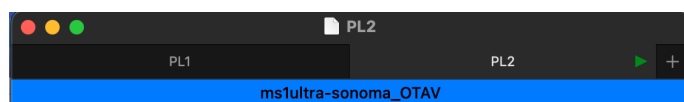
- **Media Browser Only:** the Media Browser is the only window accessible. When enabled, **Local Validation** allows you to validate a clip.
- **Playback Observe:** You only observe the playout.
- **Playback Control:** You have full control of the playout.

## 11.2.1. Remote Control Playlists

Now that the computer is connected, you can remotely control the playout channel. Just below, you can see at the left a playlist from the playout channel and at the right, the same playlist and clips made visible by the Remote client.



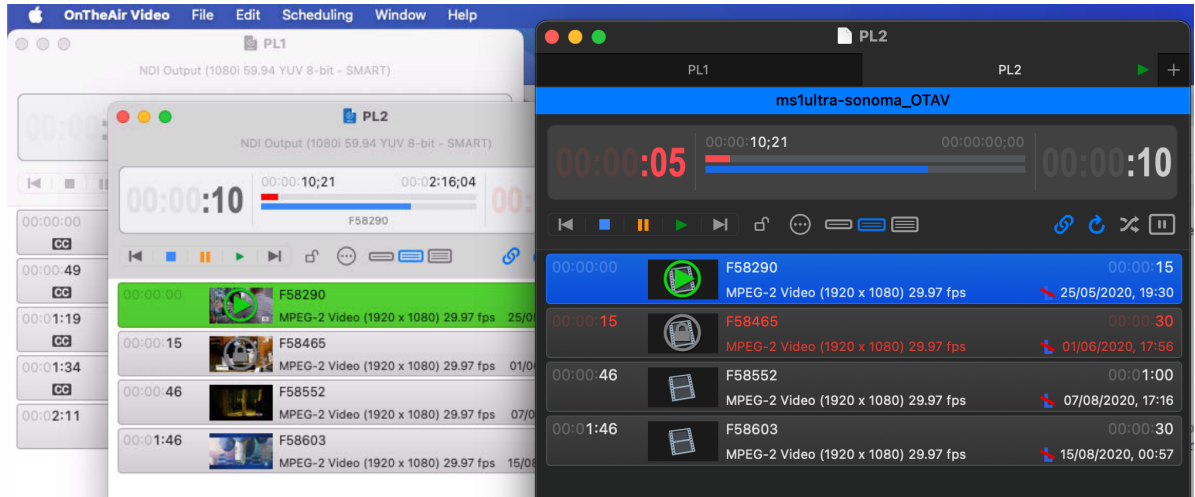
The Remote Client can only show playlists that have been saved at least once in the Playout channel. Once a new playlist is saved, it will be shown as a new tab in the Remote Client:





# OnTheAir Video User Manual

With Remote Control, the Remote Client can control the playlist as if it was on the user's computer. You can add or remove clips, play or stop the channel, go to the next clip, etc. It will automatically update the Playout Channel. Here's an example of a playlist controlled using Remote Control:

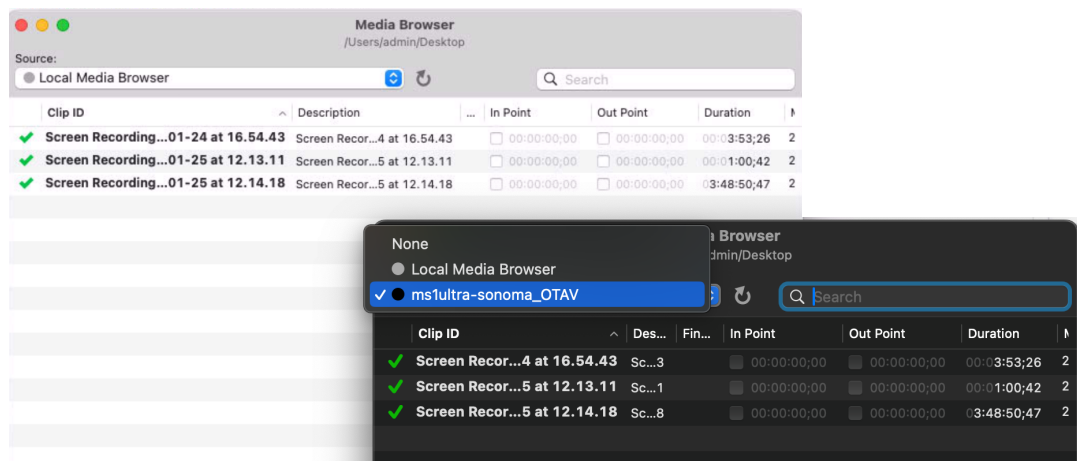


Note that you can control multiple OnTheAir Video playout channels at the same time. You can find [tutorials on our Youtube channel](#).

## 11.2.2. Remote Control the Media Browser

On the playout channel, you can open the Media Browser (available with [the Remote Control option](#) or [the Traffic option](#)). This window allows you to visualize the content of the Media Folder. It is also useful because there can be a link between the media browser and the playlists.

It will be visible by the Remote Client by opening the **Source** window. In there, you can access the clips from the Playout channel's Media Folder.



Everything about the Media Browser is explained in the chapter [“Media Browser”](#)



# OnTheAir Video User Manual

## 12. Media Browser

Not available in OnTheAir Video Express.

(Available with [the Remote Control option](#) or [the Traffic option](#))

The Media Browser allows you to visualize the content of a local or a remote Media Folder. It is also useful because there can be a link between the media browser and the playlists. You can change the Clip ID, add In and Out Points, etc. Media Browser can also be used with the [Traffic option](#), as playlists coming from Wide Orbit do not have any information on the path to access the media, so the user must select a folder where the media will be.

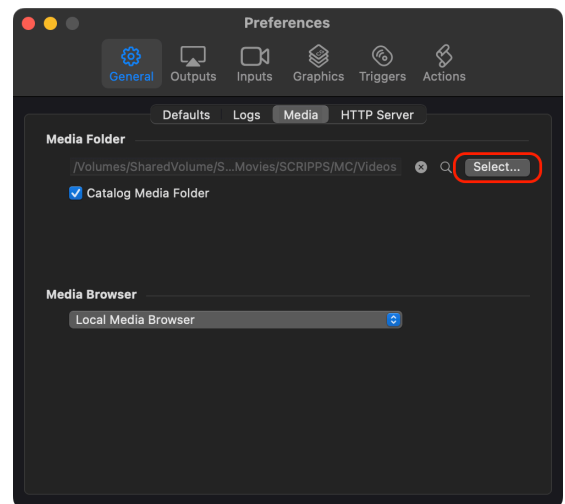
### 12.1. How to Set It Up

You can either use a "Local" or a "Remote" media browser. Sometimes you want to limit the number of things that the computer playing out is doing. This is why instead of having it catalog the media, you can offload the media cataloguing to a separate, remote, computer. Note that this makes the setup a little more complex, so if you want to keep things simple, just use a local media browser.

#### 12.1.1. Set Up a Local Media Browser

Choose the folder where all your videos will be, go to the top menu "OnTheAir Video > Settings > General > Media" and select a folder.

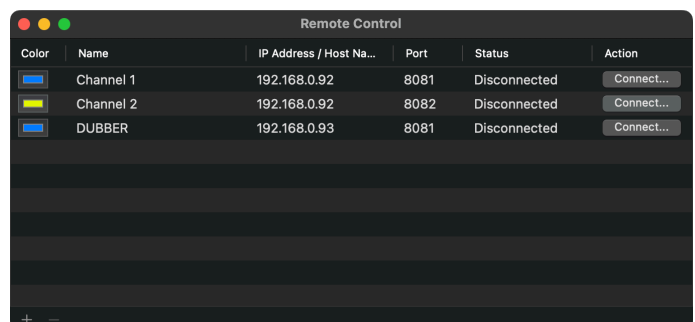
If you are using a local media browser, make sure to leave the "Catalog Media Folder" enabled. You should disable the Media Folder catalog only if you are using a remote media folder. Note that all files should be within the same folder; it is best not to use subfolders.



#### 12.1.2. Set Up a Remote Media Browser

Before being able to set up a remote Media Browser, you will first need to set up one of your other computers as a "Local Media Browser" so it will catalog the media. Note that this can be done using a demo version of OnTheAir Video.

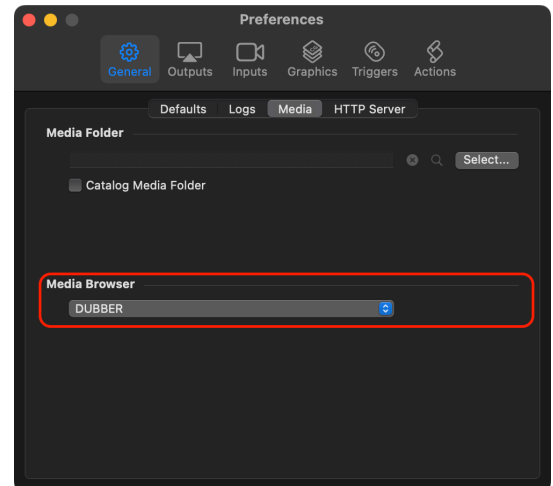
Then you will need to connect to that OnTheAir Video. For this, go to the menu "OnTheAir Video > Remote Control...". This will open a window, where you will be able to connect to a remote OnTheAir Video:





# OnTheAir Video User Manual

Once it is set up, and you are connected to the OnTheAir Video doing the media folder cataloging, make sure to disable the "Catalog Media Folder" option on the playout computer, so you are sure OnTheAir Video will not catalog any folder, and then select the remote media browser you want to use in the "Media Browser" drop down menu:

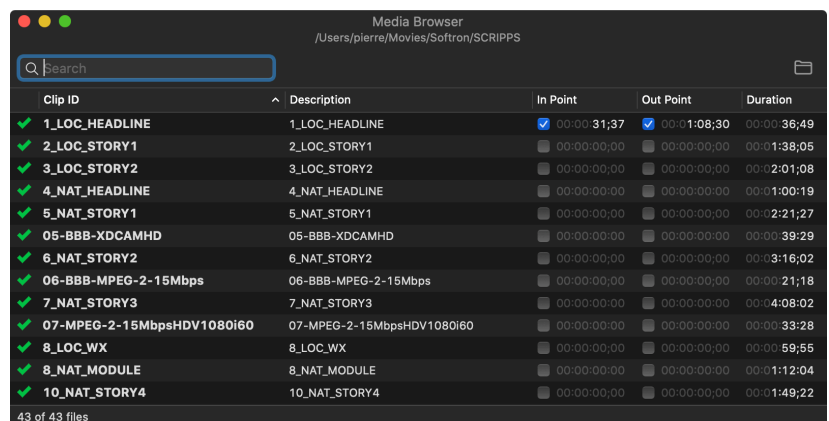


## 12.2. How does it Work?

Once you have set the local or remote media browser that you want to use, you can go to the menu "Window > Media Browser" to show the Media Browser window:

You can view the different columns:

- **Clip ID:** by default the "File Name". As these are usually codes, it is not easily readable.
- **Description:** something humanly readable and can be edited
- **In/Out Points and Duration**



### 12.2.1. Changing In/Out Points or Attributes

You can change in/out points directly in the Media Browser. For that, enable the checkbox next to the in or out point and manually enter a value there. But note that there are no validations, for example, with the duration of the clip. So the better option is probably to do it in the inspector.

To change the clip's attributes in the inspector, select the clip in the Media Browser, then open the inspector from the menu "[Window > Clip Inspector](#)". Anything you set there will be saved in the Media Browser, so when you drag and drop from the Media Browser to the playlist, everything you have set will be there.



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## 12.3. The Link with Playlists

In some cases, there can be a link between the Media Browser and the playlist, so if you modify the clip's attributes (in/out, name, actions...) in the media browser, they will be updated in the playlist. This is very useful, to be able to modify a clip that is present in multiple playlists or has multiple occurrences in the same playlist.

The link happens in two cases:

- if you drag and drop a clip from the media browser to one or more playlists
- if you open a .WOS playlist from the traffic (Go to chapter "[Traffic option](#)")



The link is only in one direction: from the Media Browser to the playlists. If you modify a clip in the playlist, it means there will be a difference between the attributes in the playlist and the ones in the Media Browser. That is not a problem, but as soon as you'll edit one attribute in the Media Browser, all the attributes in the playlist will be reloaded with the ones from the Media Browser.

### 12.3.1. How to Identify if a Clip in a Playlist has a Link to the Media Browser?

#### In the playlist:

You will see that the first line of the cell is bold compared to other clips not linked to the Media Browser.

- *The bold part* is the "Clip ID" from the media browser
- *The plain part* is the "Description" from the media browser

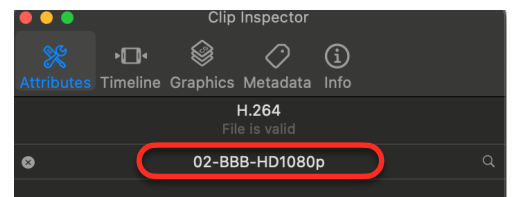
00:44		<b>07-MPEG-2-15MbpsHDV1080i60</b>	00:00:00
		HDV 1080i60 (1920 x 1080) 29.97 fps	17/07/2013, 11:11
01:18		<b>02-BBB-HD1080p H.264</b>	00:01:18
		H.264 (1920 x 1080) 29.97 fps	17/07/2013, 13:00
2:52		06-BBB-MPEG-2-15Mbps	00:00:00

Note that if Clip ID and Descriptions are identical, we will only show one occurrence in bold.

#### In the inspector:

At the top of the window, you will see an area with the Clip ID:

You can use the "X" button to remove the link to the media browser (the clip in the playlist will thus be independent) and the magnifying glass to reveal the clip in the Media Browser.



### 12.3.2. How can the Link be Lost?

The Clip ID is what we use to make the link between the clips in the playlists and the clips in the Media Browser. So if you modify the Clip ID in the Media Browser, you will lose the connection.





## 13. External Controls and Integration

With its flexible system of "Actions", OnTheAir Video can send SCTE35 triggers, overlay dynamic graphics ([with the DGO option](#)), control multiple external devices such as Character Generators, video routers, and logo inserters. Actions can be triggered at any moment of a clip within a playlist. Actions are AppleScripts, so it is very easy to customize them and create macros to perform multiple controls with a simple action.

### 13.1. Working with Actions (Secondary Events)

Not available in OnTheAir Video Express.



This chapter pertains to OnTheAir Video 4.2 or later, if you are using version 4.1 or earlier, [check this article](#).

An Action in OnTheAir Video is what is sometimes called a "**Secondary Event**". The secondary event can be happening in OnTheAir Video itself, or outside of OnTheAir Video. Here are some examples of what you can do with Actions:

- In OnTheAir Video:
  - > **Control a project of the Dynamic Graphics Overlay** (Requires the [DGO option](#)): start/stop a ticker, lower third, clock. Or modify a text item, image or video link, etc. [Read more...](#)
  - > **Control a video router**: change crosspoints on a Blackmagic-Design VideoHub or Ross router.
  - > **Output a SCTE trigger** (Requires the [CC option](#)): send a SCTE35 trigger on the SDI output. [Read more...](#)
- Outside of OnTheAir Video:
  - > **Control a project in OnTheAir CG Server**: start/stop a ticker, lower third, clock. Or modify a text item, image or video link, etc... [Read more...](#)
  - > Change the status of the **GPICommander outputs**.
  - > Start/stop recording in [MovieRecorder](#).
  - > And many more things. As an action is an [AppleScript](#), you can basically control any application that is AppleScriptable — send an email, for example.



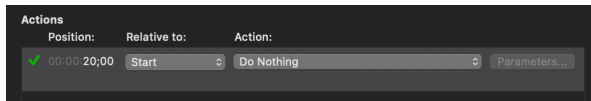


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## 13.1.1. Adding Actions

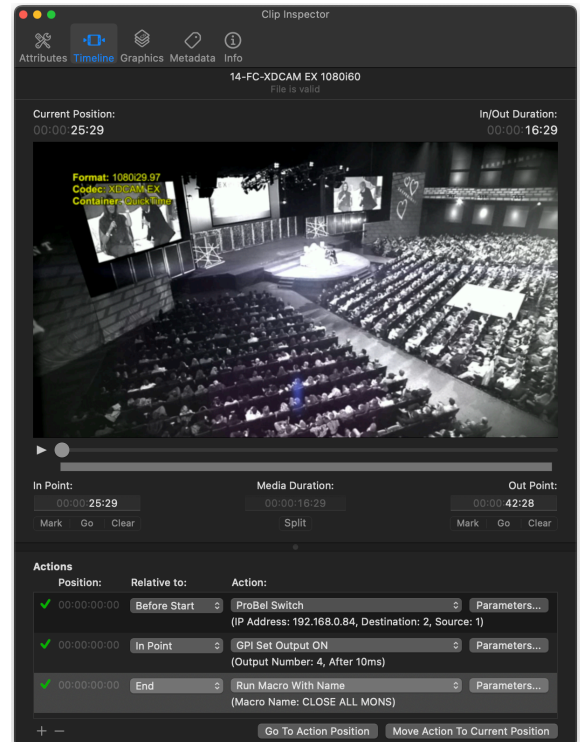
To add an action, select a clip in your playlist, then show the Inspector and select the "Timeline" pane.

To add an action to a clip, first scrub in the preview above to the moment you want the action to be triggered, and then click on the + icon. This will create something like this:



With the following info:

- The **checkmark/cross**: tells if there is a problem with the Action. If you see an "X" there, check the "possible errors" section below.
- **Position**: the moment at which the action will be triggered. Make sure to check the "Relative to" column. The "Relative positions" are explained below.
- **Actions/Parameter**: There you will select the action that you want to do, and its parameters. See below for the different types of actions.



## 13.1.2. Adding Actions

An Action can be triggered at any moment of a video file. You can then select whether or not you want the position value to be shown as "relative to":

- **Before Start**: This happens when clips are chained and we prepare the next one. This allows you to control video routers in a clean way. It usually happens 8 seconds before the next clip. If the clip is not playing in chain, but you manually start it (if you double-click, press play, etc), we will wait for 1 second to receive the confirmation that the action was successfully performed. *Typical usage*: When controlling a video router, this allows for the switching action to be completed before we start playing a live (otherwise you would see a few flash frames at the beginning).
- **Start**: The position indicated is relative to the beginning of the clip, no matter where the in point is set. Note that if your in point is after the action position, it won't be triggered. A red "X" will show up in such cases. *Typical usage*: this type of position is used for lower thirds, for example, where you want a lower third graphics element to be played at the exact position, whatever the in point of the clip may be.
- **In Point**: The position indicated is relative to the in point. This means that the action will move depending on the in point that you set. If no in point is set, the position will be relative to the start of the clip. *Typical usage*: this is used if you want an action to be triggered all the time at the beginning of the clip, or after 20 seconds for example, and this whatever the in point may be.

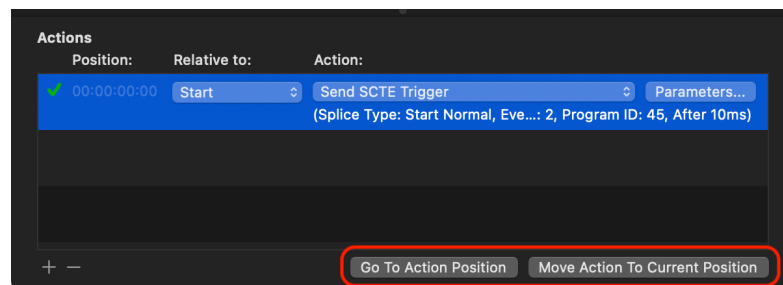


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- **Out Point:** The position indicated is relative to the out point. This means that the action will move depending on the out point that you set. If no out point is set, the position will be relative to the end of the clip. *Typical usage:* this is used if you want an action to be triggered at the end of the clip, or 20 seconds before the clip stops playing, for example, and this will trigger at whatever the out point may be.
- **End:** The position indicated is relative to the end of the clip, no matter where the out point is set. Note that if your out point is before the action position, it won't be triggered. A red "X" will show up in such cases. *Typical usage:* this is used for lower thirds, for example, where you want a lower third graphics element to be played at the exact position, whatever the out point of the clip may be.

## 13.1.3. Going To / Moving Actions

When you select an action you can click on either of these two buttons:



- **Go To Action Position:** will move your playhead to where the action will be triggered.
- **Move Action To Current Position:** will change the position value to match the current position, and "relative to" setting. Note that you can also enter a TC value manually in the Position column.

## 13.1.4. Types of Actions

At the time of writing (but we'll add more over time), here are some of the actions that we support:

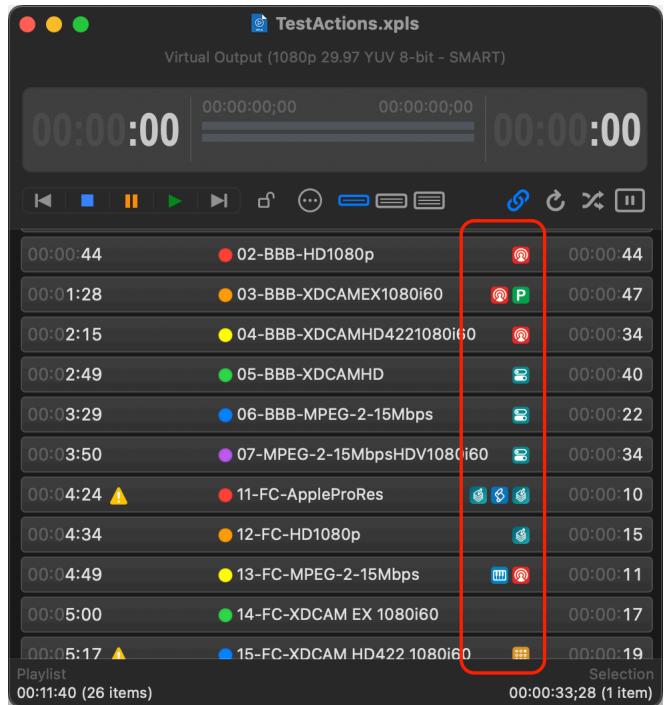
- **ATEM:** Change the input used as program output, with or without transitions (will do a TAKE or a CUT) and Start a macro
- **AppleScript:** [\(see below\)](#)
- **GPI:** Trigger a GPI output (Pulse, On or Off). Make sure to select the GPI to use in "Settings > Triggers > GPI Commander"
- **Graphics:** Start/Stop a project of the Dynamic Graphics Overlay option. Configure this in "Settings > Graphics"
- **MIDI:** Output a note or other to the MIDI device selected in "Settings > Triggers > MIDI"
- **Playback:** Performs playback actions, such as play next clip, stop playback, pause.
- **Routers:** Control video routers from Ross Ultrix or Blackmagic-Design Videohub
- **SCTE:** Trigger SCTE-35 events on the output



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Depending on the type of action you have selected, you will see different icons in your playlist:

Once you have selected your action, you can edit its parameters. For each parameter, you will also see an "After Delay (ms)" option. This allows you to define a delay between the moment the action is triggered and when the secondary event is actually triggered. This is useful if you have an action running at the start of a clip, but need to delay the action a little bit before it's actually done.



## 13.2. Control with AppleScript Actions

Not available in OnTheAir Video Express.

Before OnTheAir Video 4.2, the only actions available were AppleScripts. It is still possible to use these AppleScripts in OnTheAir Video 4.2 and they work the same way.

### 13.2.1. How to create the AppleScripts?

They must be formatted in a certain way. Basically all you have to do is to add an "On Action" at the beginning and "End Action" at the end of the script, so it would look like this (to play a [DGO project](#) in OnTheAir Video):

```
on action(Parameter)
    tell application "OnTheAir Video"
        tell project "LowerThird"
            play
        end tell
    end tell
end action
```

Note that the "Parameter" variable is what can be sent from OnTheAir Video. So you can write one script, and do different things depending on what you set in the "Parameter" field in the OnTheAir Video inspector.



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We have sample AppleScripts that you can download, and you should start from there. Check [this article](#), which provides you with some sample AppleScripts. Don't hesitate to contact us if you have questions. While we won't be able to write all the AppleScripts for you, we can give you some recommendations.

## 13.2.2. Where should I save these AppleScripts?

Actions should be placed in the following folder (if using OnTheAir Video):

```
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video/  
Actions
```

If you are using the "multi" version of OnTheAir Video, there will be one folder per "channel":

```
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video 1/  
Actions  
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video 2/  
Actions
```

## 13.2.3. About the AppleScript Authorization

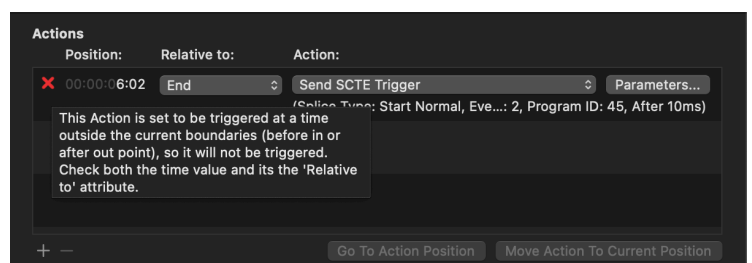
When working with AppleScripts and controlling other software, macOS sometimes requires you to authorize the script to control the software, for obvious security reasons. If you don't authorize it beforehand, macOS will show a warning the first time the script is executed. As this can cause issues during production, we have added a way to force the authorization.

For this, go in "OnTheAir Video > Settings > Actions". You will see the list of Actions that you have saved in the Actions folder and an "Authorize" button next to it. This will execute the script, so you may want to be careful with this, and maybe have one "authorization" script that will not actually do anything...

## 13.2.4. Possible Errors or Warnings

There are two possible errors or warnings on a clip:

- A **Red X**: means that the action will not be triggered. Either because, for example, an in point has been set and the action was before that in point, or perhaps there is a missing AppleScript file.
- A **Yellow Arrow**: means that the action will be triggered, although it was set just a little bit before the in or after the out point, but we have a tolerance that will force it to be triggered.



When you see a Red "X" or the Yellow Arrow before an action, hover your mouse over the warning and you should see an explanation.



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## 13.3. Control using the REST API

Not available in OnTheAir Video Express.

OnTheAir Video can be controlled using a REST API. OnTheAir Video uses port 8081 for the REST API.

If you are using a "multi" version of OnTheAir Video, the port numbers will change:

- 8081 is for OnTheAir Video 1
- 8082 is for OnTheAir Video 2
- 8083 is for OnTheAir Video 3
- etc...

### 13.3.1. Retrieve the API from the Application

The best way to get the most up-to-date documentation for the OnTheAir Video REST API is to start the OnTheAir Video application on a Mac, and then simply type in a browser on that Mac:

<http://localhost:8081/api.html>

This will return a page with all the API documentation.

### 13.3.2. About WebSockets

We have WebSockets in OnTheAir Video so you can be notified when something changes. You should be able to open a WebSocket for timecode update about playback with this URL: `ws://localhost:8081/playback`

It is also important that, when you connect, you provide the correct supported protocols as we will only send messages to clients who support our protocols.

Below is the list of the protocols we support BUT it is also important that you connect to a specific endpoint. For instance, if you want updates on a specific playlist, you will need to open a WebSocket at: `ws://127.0.0.1:8081/playlists/<playlist unique ID>`

- |  |  |
|--|--|
| • "playback_update_v1"                   | <i>// playback status is changing</i>        |
| • "playlist_update_v1"                   | <i>// a specific playlist changes</i>        |
| • "playlists_management_v1"              | <i>// playlists are being open/closed</i>    |
| • "playlist_items_start_times_update_v1" | <i>// item start times inside a playlist</i> |
| • "live_sources_update_v1"               | <i>// live sources change</i>                |

Attached is a sample page so you can get started: [websocket\\_client\\_2.html](#)



# OnTheAir Video User Manual

## 13.4. Using the Stream Deck Controller

Available in OnTheAir Video Express only with the built-in integration, or in Bitfocus companion only through the HyperDeck Emulation.

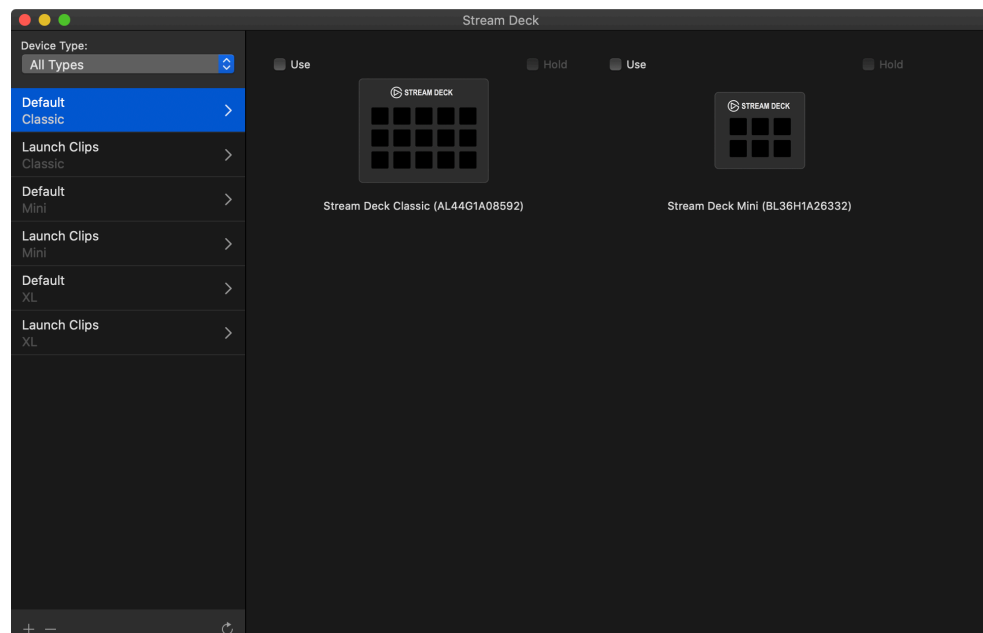
OnTheAir Video can be controlled simply using a Stream Deck from Elgato. Different options exist:

- Use the integration that we have built in our software,
- Or use the [Bitfocus Companion](#) and either:
  - Some Companion "Modules"
  - Our RESTfull HTTP AP
  - Our HyperDeck Emulation feature
- Or use the software that Elgato is providing,

### 13.4.1. Softron Integration

First, start your Softron application. Depending on the application that you use, you will have different layouts.

If you go to the menu "Window > Show Stream Deck window", you should see a window such as this one:



There are two sections in the window:

- To the left is the list of available pages, with their names and which kind of Stream Deck device they are for.
- To the right is the list of Stream Deck devices that are connected to your computer. On the screenshot above, there is a "Classic" and a "Mini".

You can select which device you want to use for each application. Before you can start using your Stream Deck, you have to drag and drop at least one page from the list on the left to one of the devices on the right.



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You can also decide to enable the "Hold" option. This option is important for two things:

- if you want to be able to trigger your Softron application, even when using a different application
- if you are using multiple Stream Decks and you want each to use a different application



In order to be able to use the Softron integration, you need to make sure that the "Stream Deck" software is not running. If it is running, it will prevent us from accessing the Stream Deck. Ensure that it is not set to automatically launch at startup.

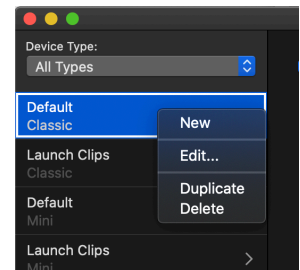
If you need help, check our webpage explaining [how to use a the Stream Deck Controller](#).

## 13.4.2. Customizing the Pages

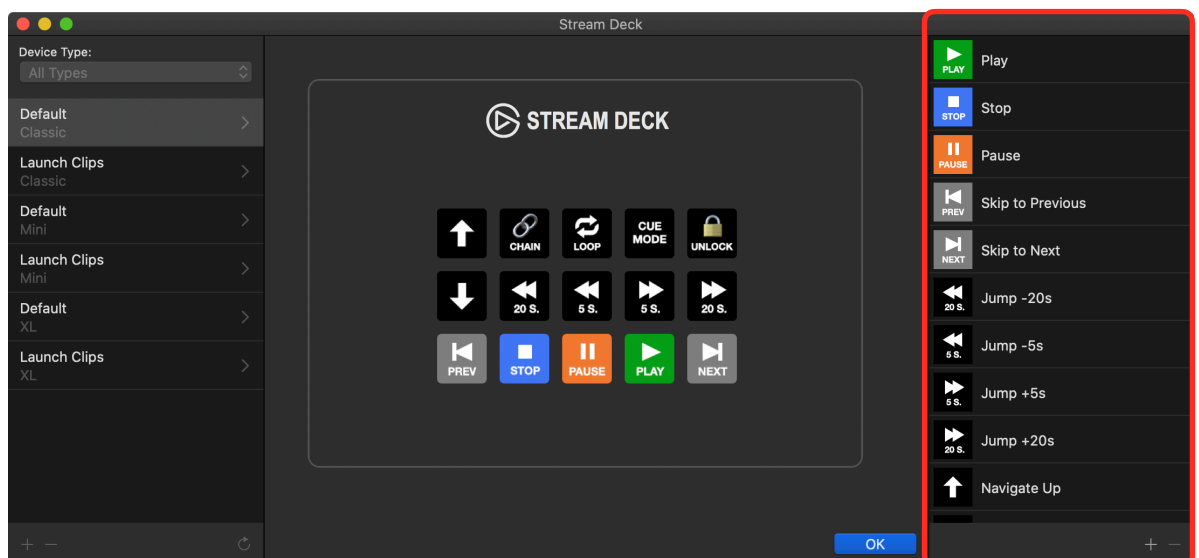
You can create new pages by clicking on the "+" icon at the bottom of the pages list:

Each page can also be modified. For this, right-click on any of the pages, and select "Edit":

Or you can click on the triangle.



When you are editing a page, you will see the device interface in the central panel, with the list of possible actions on the right:



You can drag and drop actions from one button to another to move them, or from the list to a button. Click on "OK" when you are done.



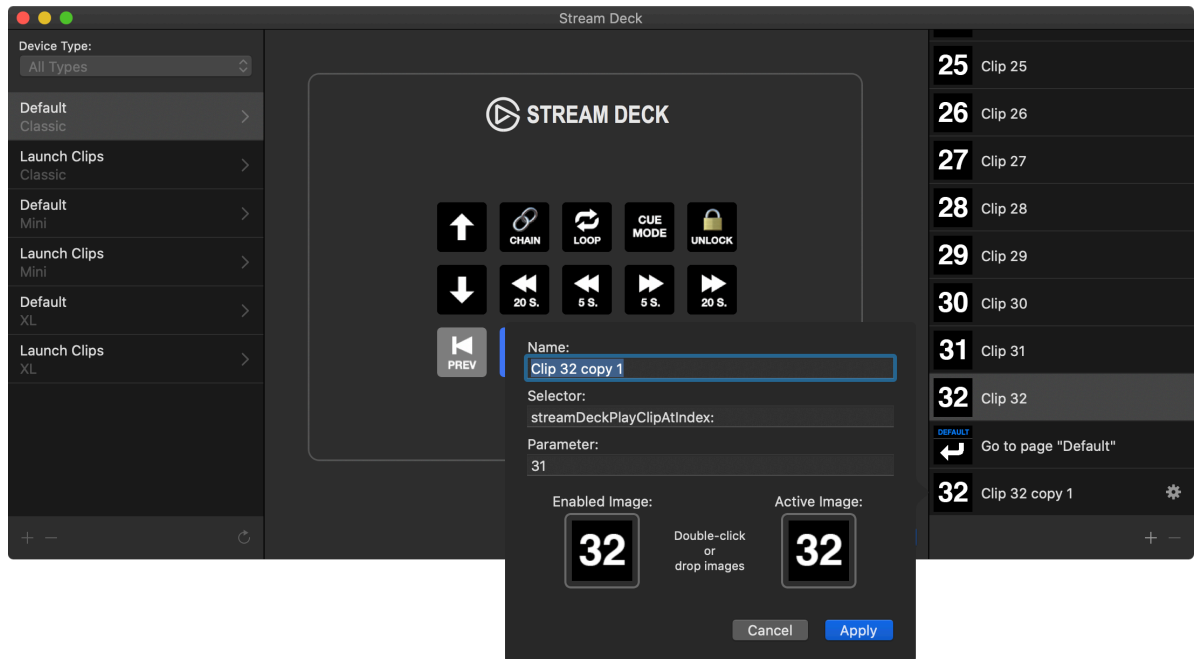


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## 13.4.3. Customizing the List of Actions

In the edit window, you can create a new action by clicking on the + icon at the bottom of the list. You can also select an action, right click, and select either "**New**" or "**Duplicate**" (note that you cannot edit the default actions).

After a new action is created (or duplicated), click on the "wheel" icon to edit it (or right-click and select "**Edit**"). This should open a window:



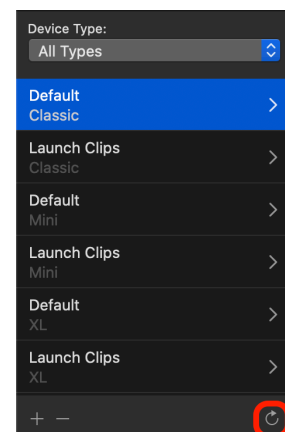
You can set:

- **Name:** This is the name displayed in the list
- **Selector:** This is the "action" that will be made. We recommend that you duplicate an existing action and then edit the parameter,
- **Parameter:** Only certain actions support a parameter. This is true, for example, in OnTheAir Video to start playing a specific clip.
- **Enabled Image:** The image that is used when the action is not active.
- **Active Image:** The image that is used when the action is active. For example, if a source is recording in MovieRecorder.

## 13.4.4. Restore to Defaults

The "**Restore to defaults**" button can be used if you want to restore to the default configuration.

Note that this can also be useful if you want to use new features or buttons that were done in a new version of the application. It will also copy the new images to the folder.







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## 13.4.5. Bitfocus Companion

First you will need to [download the application from Bitfocus's website](#). Once installed, start it, and click on the "Launch GUI" button.

A few questions will be asked during the setup, so we suggest that you check the documentation online to set it up the best way to match your needs. In the case below, we use a module for OnTheAir Video.

### 13.4.5.1. Using a Module

To control OnTheAir Video with Bitfocus, you will need to find the IP address of the computer where it runs (check the network settings) as well as the port number. You can find the different port numbers either [in the articles in our help center](#), or simply by checking the settings of your application.

- Once you have done the first steps of your setup, in the "Connections" tab of Companion, search for "Softron" to show all modules available.

- Click on "Add" next to the module you want to use.

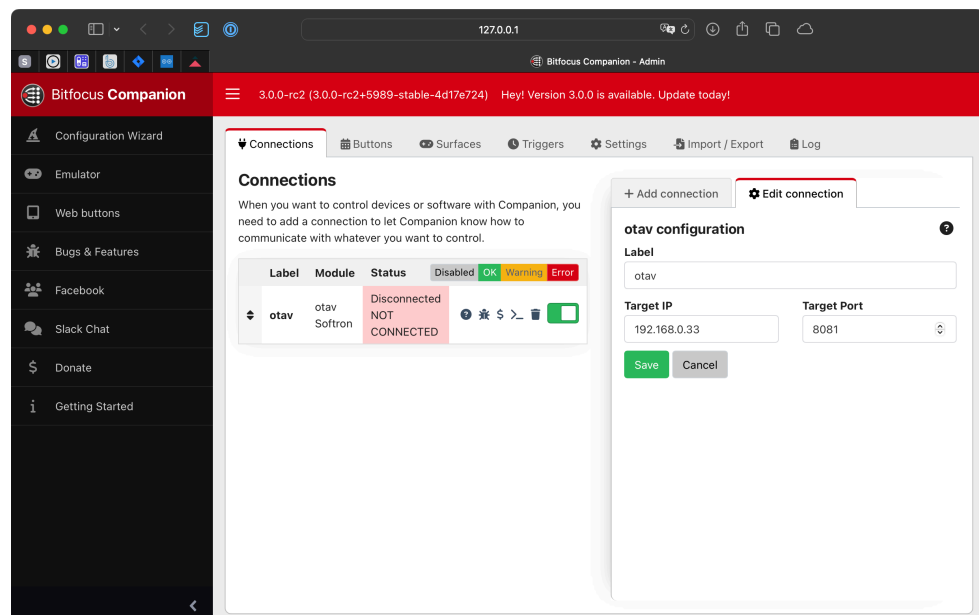
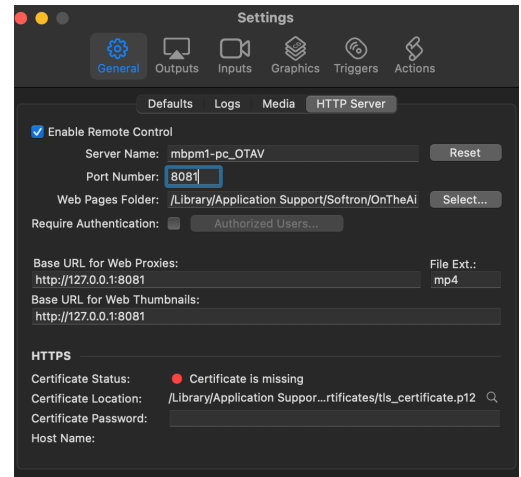
- Then configure:

The Label = how it will be shown in the Companion settings

Target IP = the IP address of the computer where your Softron application is running

Target Port = the port number used by your Softron Application.

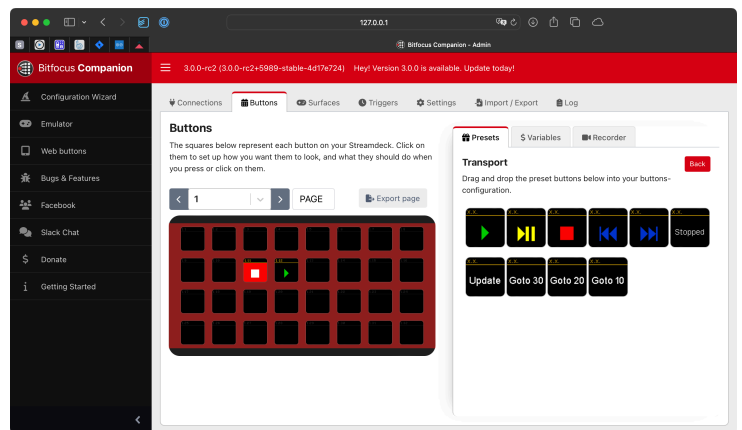
Once this is set up, you should see that the Status is now "Connected".





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Now go to the "Buttons" pane, where you will see the Presets for MovieRecorder. Click on the red button to show the different types of actions. You will see the different "Presets" available to control OnTheAir Video. You can now drag and drop these on buttons to assign them:



That's it, the buttons should now show up on your Stream Deck. If you want to emulate on your computer, you can click on "Web buttons" in the left list. Of course, there is more to it. You can also edit the preset buttons and modify them to your liking.

## 13.4.5.2. Using the REST API

If you want to do actions not available in the OnTheAir Video modules, you can use our REST API. you can find some [information about our REST API on our support desk](#). If you need more info, don't hesitate to [get in touch with us](#). All the steps are explained in [our online article](#).

## 13.4.6. StreamDeck Application

We won't go into too much detail, as you can find a lot of info on Elgato's website or on the web about this, but the idea is that you should first [download](#) and install the Elgato Stream Deck software.

Again, if you use the Softron integration, you should NOT start the Stream Deck software as it will prevent us to access the Stream Deck. It can be present on the computer, but not running.

Once installed, you will be able to configure the buttons.

For an integration with the Softron software, you will have to either:

- Send REST requests.
- Emulate keyboard shortcuts (you will have to know the [keyboard shortcuts](#) that you can use in our application).

The advantage of the keyboard shortcuts is that it's way easier to do, but the downside is that you will have to make sure that the application is the front application for the keyboard shortcut to work. If it's not the front application, the keyboard shortcut might do something different. The REST requests are a little harder to setup, but will work whether or not the application is in front or not. All the steps are explained in [our online article](#).



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## 13.5. Control with GPICommander

[GPICommander](#) is two things: a USB to GPI Converter and a software application. You can send or receive GPI triggers using AppleScript, so it can be used with any application under MacOS X.

It has 24 inputs (open-collector type, common ground) and 8 independent relay outputs. Since each unit has a unique serial ID, you can chain more than once on the USB bus to have more inputs and/or outputs.



### 13.5.1. Connecting the GPICommander Box

You will need to:

- Connect the GPICommander device to the computer where OnTheAir Video is running.
- Connect the GPICommander's inputs **to your device** (it can be a production switcher GPI/tally output or a simple push button box) using the DB25 connector. Check the [User manual](#) for instructions on how to connect it.

With OnTheAir Video you will mainly use the inputs. These 24 inputs are available through a DB25 connector, where an action will be triggered in OnTheAir Video when any of the first 24 pins is connected to the "ground" (on pin 25).

### 13.5.2. With the Direct Integration or AppleScripts?

To control OnTheAir Video with GPICommander, you have two options:

- with the **direct integration**: you just have to connect the GPICommander box to the computer and go to the Settings of OnTheAir Video to set it up. This is the easiest way. This works with OnTheAir Video and OnTheAir Video Express.
- with **AppleScripts**. This requires you to know how AppleScripts work, as well as installing the software [GPICommander](#), but it offers a lot of possibilities. For example, you could control multiple applications with just one GPI trigger. This works only with OnTheAir Video, as OnTheAir Video Express cannot be controlled with AppleScripts.

### 13.5.3. Use the Direct Integration

Open the OnTheAir Video settings, and select the GPICommander to be used in the top left dropdown menu. You can connect multiple GPICommanders to one computer, but only use one in OnTheAir Video. They will be listed with their serial numbers.

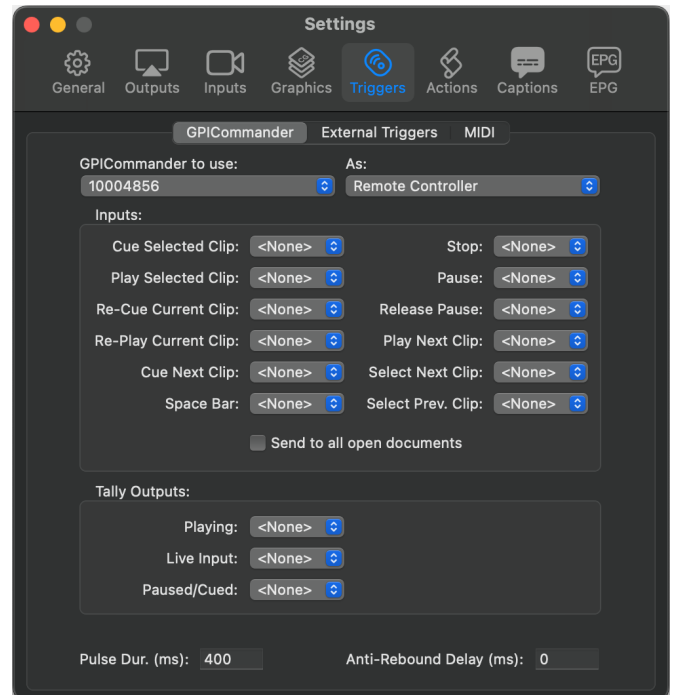


# OnTheAir Video User Manual

Once you have selected the GPICommander to use, select the type of behavior that you want in the "As" drop down menu.

You can decide for three types of usage:

- As Remote Controller (more for generic uses)
- As Video Switcher (specifically when used with a production switcher)
- As multi-usage (More advanced type that adds playback controls, graphics, SCTE... Inputs)



## 13.5.3.1. GPICommander "As Remote Controller"

When you select to use GPICommander "As Remote Controller", you will be able to set 2 type of things:

- **Input Actions:** set the action to be performed when a given GPI input is triggered
- **Tally Outputs:** set the output to put on depending on the status of OnTheAir Video

### Input Actions:

You will see is a list of different actions that can be performed. For example, the "Play Selected Clip" action when triggered will start playing the selected clip in the "Front" playlist. You must then define which input should be monitored for that clip on the popup menu next to the action.

Select for example "In 1". In that case, as soon as input 1 of the selected GPICommander turns to on, the selected clip in the from playlist will start playing.

You can configure all actions like that. They are quite "self-explanatory". The only things to note are:

- **if no clip is selected**, then the action will be done on the first clip in the playlist
- the **"Space Bar"** action will mimic the behavior done when you use the "Space bar" on your computer. This can be quite useful for cue mode, etc...

### Tally Outputs:

There are two kinds of status that can be monitored:

- **Playing:** when OnTheAir Video is playing a clip, the selected output will be put to on.
- **Paused/Cue:** When OnTheAir Video is paused or cued, the selected output will be put to on.



# OnTheAir Video User Manual

## 13.5.3.2. GPICommander "As Video Switcher"

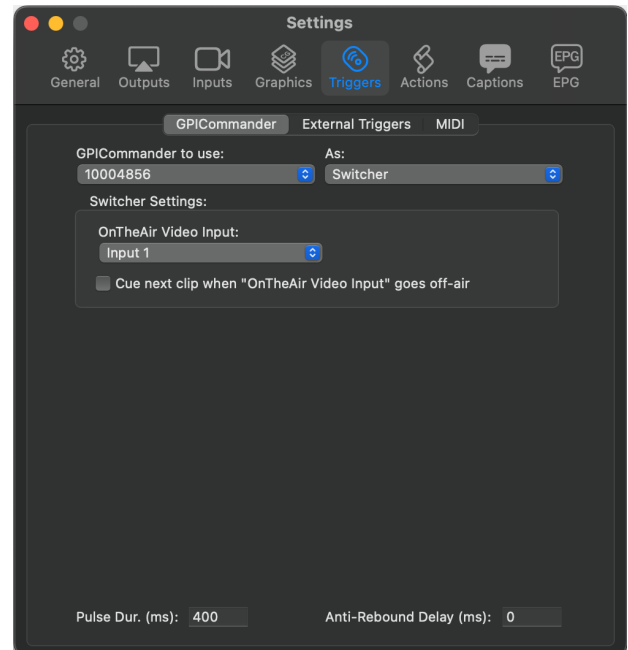
When you select to use GPICommander "As Video Switcher", the behaviors will be different, and is mainly used when GPICommander is connected to a Production Video Switcher. It is not mandatory, and you can use the "As Remote Controller" mode when connected to a Production Video Switcher, but basically the behaviors here will be identical to the ones when using an "ATEM Switcher".

You will have two settings:

- **OnTheAir Video Input**
- **Cue next clip when "OnTheAir Video Input" goes off-air**

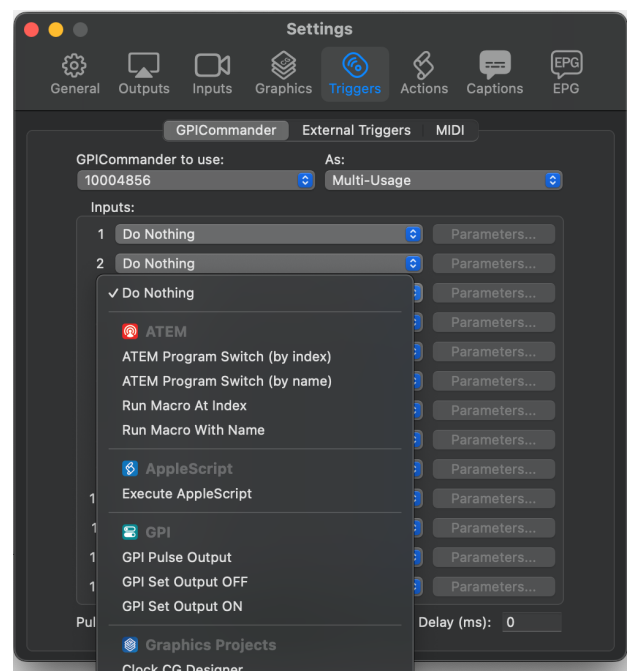
The behavior will be as follows:

- as soon as OnTheAir Video sees that the monitored input goes to on (it is then in use on your production switcher), it will start playing the selected (or cued) clip in the front playlist
- then when the monitored input goes back to off (it is not in used anymore on the production switcher), and if the "Cue next clip when OnTheAir Video Input is deselected" option is enabled, we will automatically cue the next clip.



## 13.5.3.3. GPICommander "As Multi-Usage"

GPI Triggers become more clever with the Multi-Usage option. This allows the operator to trigger SCTE, graphics, playback controls, and even ApplesScripts all from a GPI Commander device. Parameters are easily adjusted and assigned, and change parameters based off the category.





# OnTheAir Video User Manual

## 13.5.4. Trigger AppleScripts when Inputs State Change

With GPICommander, you can trigger an AppleScript when the state of any of the 24 inputs change. You can trigger an AppleScript when the state changes from closed to opened or from opened to closed. These AppleScripts can control any application on the Mac that is AppleScriptable (and MovieRecorder is AppleScriptable).

For this you will need to download the [GPICommander](#) application from our website. This is the application that will trigger the AppleScripts. It is best to learn about [the basics of GPI commander and apple scripting with this article](#).

The GPI Commander application will have one AppleScript per input. Here is the path to input 1's AppleScript:

`/Applications/GPICommander/Actions/Input 1.scpt.`

We have four sample scripts attached below to control a MovieRecorder on the same machine as GPI Commander. We can trigger a specific source, or all sources, to start or stop. Each script can be opened in Script Editor, where there are comments to help explain the operations in the text.



Our GPI commander available [on our website shop](#).



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## 13.6. Control Macros on the ATEM

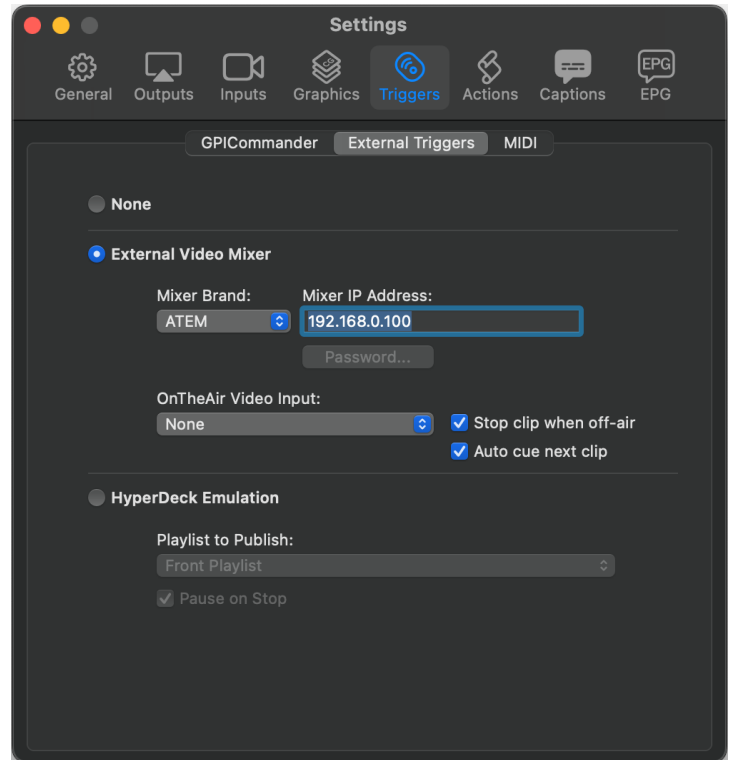
Not available in OnTheAir Video Express.

To make this work, go to the top menu "OnTheAir Video > Settings > Triggers > External Triggers", and select to use the ATEM and enter an IP address.

Also make sure to select "**None**" for the "**OnTheAir Video Input**" drop-down. If you leave an input selected there, it will start playing in OnTheAir Video every time that input is selected (unless that is what you want of course).

Attached is a sample AppleScript that you can use as an action in OnTheAir Video. We will use the name of the Macro in the ATEM in the script.

[OTAV\\_RunATEMMacro.scpt](#)



## 13.7. Control CG Projects from the Actions

Not available in OnTheAir Video Express.

You will need [the DGO option](#).

See explanations about [the Dynamic Graphics Overlay option for OTAV in chapter: Graphics](#).

When you change the status of the item's attributes in the clip inspector, this value is applied for the whole duration of the clip. This works well for projects that run for the whole duration of a clip.

If you want to start the project at a specific timecode in your clip, and have the same project play multiple times during a clip, but with different text or images overlay, you will need to use Actions.



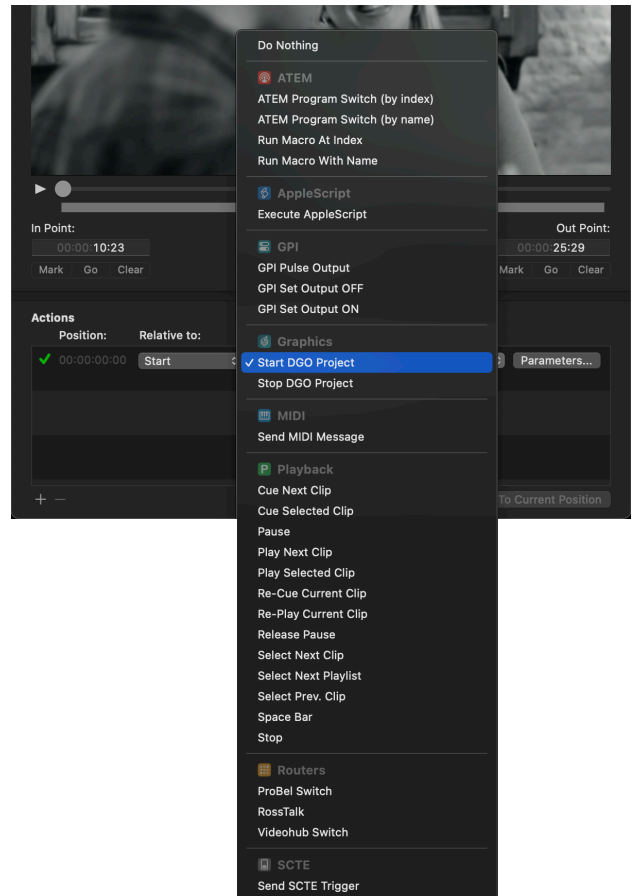


# OnTheAir Video User Manual

## 13.7.1. Using "Direct" Actions

With OnTheAir Video 4.2, we have introduced [new ways to trigger actions, make sure to read this article](#). When using "**Direct Actions**", you can use the "**Graphics**" type of actions, which allow you to start/stop a project.

Once you have selected the action type, click on "**Parameters...**" to select the project you want to start or stop. At the time of writing it is not yet possible to modify the content of text fields, for example, or to control items within projects. To do that you will still need [to use "AppleScript" Actions](#).



## 13.7.2. Using "AppleScript" Actions

AppleScript actions can be used with all versions of OnTheAir Video. These were the only actions possible before OnTheAir Video 4.2.

Attached to this article you will find a CG project and a sample Action. The CG project, you can place it wherever you want, just import it in the Settings as explained above. As for the Action, it should be placed in the following folder (if using OnTheAir Video):

```
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video/  
Actions
```

When the action is imported in the correct folder, go in the "Clip Inspector > Timeline" and scrub in the timeline to select when you want to CG project to start playing and click on the "+" icon to add a new action at that position.





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## 13.8. Trigger SCTE Signals

Not available in OnTheAir Video Express.

You will need the [CC option](#).

SCTE signals are used to trigger markers downstream of the SCTE broadcasting source. These markers are used to signal an inline insertion opportunity for devices downstream such as commercial breaks or alternative programming. A daily example of this would be watching major television network's primetime programming. When a local commercial opportunity is available during network programming, a SCTE message is sent to the local broadcaster with identifiers and data like event ID and duration. Then the local broadcaster's commercials will playout and return back to the main program.

### 13.8.1. Difference between SCTE 35 and SCTE 104?

- **SCTE 104** applies only to SDI baseband video (in the VANC)
- **SCTE 35** applies to transport streams (compressed video)

### 13.8.2. Requirements

To trigger SCTE (35 or 104), you will need:

- Either the free DEMO version of OnTheAir Video 4, or if you use a valid [license of OnTheAir Video 4](#), you will need the [CC option](#).
- A video device that supports to output VANCs (all recent cards that we support and that have a SDI output should work fine, but older models of Blackmagic devices may not support it). Note that for AJA cards, you need to enable VANCs in AJA Control Panel.

Note that we write the SCTE info in the VANC of an SDI output, so this will only work with an SDI output. When using the direct link (for example to send video from one of our playout application to another), the SCTE info is preserved.

There are two ways to trigger SCTE:

- **With the SCTE trigger embedded in an MXF file**
- With an **Action on OnTheAir Video**.

### 13.8.3. SCTE embedded in an MXF File

You can embed the SCTE info in a MXF file containing special VANCs of DID 0x41 and SDID 0x07. Those triggers will be passed on to the SDI output signal.

The advantage of this solution is that the SCTE trigger will always follow the video file. There will be nothing to do, but it may be complex to generate.

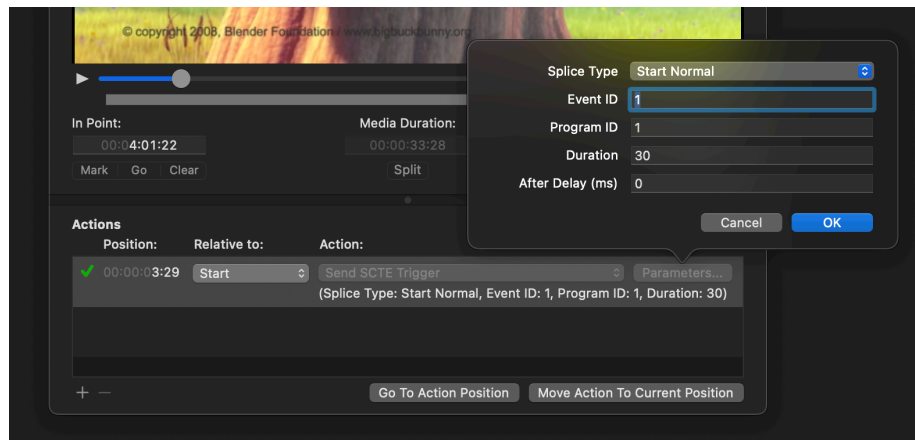
### 13.8.4. SCTE using Actions

In OnTheAir Video 4.2 or later, actions can be more than just an AppleScript. You can still use the AppleScript that you were using in OnTheAir Video 4.1 or earlier, but additionally you can create "Direct" actions which do not go through AppleScripts.



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Just select the SCTE trigger type in the "Inspector > Timeline > Actions" section. Then click on "**Parameters...**" to edit it.



- **Splice types:** Depending on the command to be sent, the "*splice\_insert\_type*" property can have a value of:
  - > *splicestart\_normal*
  - > *splicestart\_immediate*
  - > *spliceend\_normal*
  - > *spliceend\_immediate*
  - > *splice\_cancel*

Please see SCTE documentation for the various splice commands.

- **Event ID:** You can set the event ID. If it is not specified, it will be automatically incremented, starting at zero when the application starts.
- **Program ID:** You can set the ID in the Program.
- **Duration (ds):** You can also send the duration of the event, simply by adding a duration, expressed in deciseconds (so if you indicate 10 it is 1 second).
- **After Delay (ms):** You can set a delay in milliseconds (ms) before the SCTE is actually triggered. This will compensate for potential delays in your output chain.

If you need more help, we have a [tutorial in our Youtube Channel with the video: How to Trigger & View SCTE with Softron Products](#)

## 13.9. Create Playlists from Third Party Solutions

There are a number of different ways to create playlists for our playout applications. These playlists can be opened or imported by either OnTheAir Video, OnTheAir Video Express, OnTheAir Manager or OnTheAir Live

You have two choices:

- **.txt files:** this is the easiest solution, but you will only be able to add clips. You won't be able to set a logo, add in/out points, etc... for that you'll have to create XML playlists
- **XML:** this is more complex, as you need to know how to generate XML files. But this is the most flexible solution as you can really set everything that you would set in the OnTheAir Video playlists: set the playlist in loop, add logo overlay, add audio gain, etc...

Everything is explained [in our website article: "HOW TO: Create OnTheAir Video playlists from third party solutions?"](#)



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## 13.10. Control a Video Router

Not available in OnTheAir Video Express.

The compatible routers for this feature are Blackmagic Videohub and Ross Ultrix. For other routers, you can still use OnTheAir Switch, [check compatibility here](#). Or Alternatively, you can use a curl request to control routers such as the AJA Kumo (sample AppleScript attached).

### 13.10.1. How to Set it Up?

There is no preference to add in OnTheAir Video, but just add an Action (AppleScript) to the "Actions" folder of OnTheAir Video.

If you are using the "single" version of OnTheAir Video, the Actions folder is located in:

```
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video/  
Actions/
```

If you are using the "Multi" version, then it will be in each instance folder:

```
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video 1/  
Actions/  
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video 2/  
Actions/  
/Library/Application Support/Softron/OnTheAir Video/OnTheAir Video 3/  
Actions/  
...
```

### 13.10.2. How to use the Script Alone or Test it?

The examples below are to be used as "Actions" in OnTheAir Video. But If you want to use the AppleScript from another application, or test them alone, you will need to remove the first (*on Action(parameter)*) and last (*end Action*) lines.

### 13.10.3. With Blackmagic Video Hub

There are two different syntaxes possible: Using the “**Switch Videohub**” method or using the **set selected input method**.

#### 13.10.3.1. Using "switch Video hub" Method

The simplest method is to do a "switch videohub". You can use either the IP address, the name or the unique ID of the Videohub. Using its IP address it will be:

```
on Action(parameter)  
  tell application "OnTheAir Video"  
    switch videohub ip_address "192.168.0.70" output_index 1 input_index  
    1 directly 1  
  end tell  
end Action
```



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Note that the "directly 1" instruction at the end of the line allows you to set whether or not the communication to the Videohub will require Bonjour or not. When setting it to 0, we will scan through the available Videohubs that we find in Bonjour, and find the one with the matching IP address. While when setting it to 1, we don't use Bonjour, and just connect to that IP address. With the name:

```
on Action(parameter)
  tell application "OnTheAir Video"
    switch videohub name "Studio Videohub 12" output_index 1 input_index
1
  end tell
end Action
```

And with the unique ID:

```
on Action(parameter)
  tell application "OnTheAir Video"
    switch videohub unique_id "8371c4cc399b" output_index 1 input_index 1
  end tell
end Action
```

## 13.10.3.2. Using the Set Selected Input Method

Here is an example of script that can be used to control a Videohub. If you only have one Videohub, you could use:

```
on Action(parameter)
  tell application "OnTheAir Video"
    tell (first videohub device)
      set selected source of destination 3 to 4
    end tell
  end tell
end Action
```

There is nothing to do in OnTheAir Video as it will automatically scan the network to discover a Videohub through Bonjour. So in the example above, we will search for the first available Videohub and use it.

You could change the script to only use a Videohub with a specific IP address.

```
on Action(parameter)
  tell application "OnTheAir Video"
    tell (first videohub device whose ip_address is "192.168.0.70")
      set selected source of destination 3 to 4
    end tell
  end tell
end Action
```



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Or using its name:

```
on Action(parameter)
  tell application "OnTheAir Video"
    tell (first videohub device whose name is "Studio Videohub")
      set selected source of destination 3 to 4
    end tell
  end tell
end Action
```

## 13.10.4. With Ross

With Ross, there are two different protocols available, depending on what your router supports.

- **RossTalk** is the most widely compatible one. But there is a caveat with it: we can't receive the information whether the switch was done or not, so we just send it out and have no knowledge if it was received and whether or not the switch happened.
- **ProBel** (or "SWP-08") is compatible only on some routers, check with Ross to see if your router supports it. The advantage is that if there is an issue to send the command or that the switch did not happen, we will receive a notification and add a log.

### 13.10.4.1. Using the RossTalk Protocol (*OTAV 4 or later*)

You just need to indicate the IP address of the Ross video router. And then specify which "command" (which GPI) you want it to execute. Check your Ross manual to know how to modify those GPI.

```
on Action(parameter)
  tell application "OnTheAir Video"
    switch rosstalk ip_address "127.0.0.1" command "GPI 04"
  end tell
end Action
```

### 13.10.4.2. Using the ProBel Protocol (*OTAV 4.1 or later*)

You just need to indicate the IP address of the Ross video router. And then specify:

- the matrix and level to use
- the source and destination

```
tell application "OnTheAir Video"
  switch probel ip_address "97.78.209.190" matrix 1 level 1 destination
  1 source 7
end tell
```

If you are looking for sample actions, go to [the website version of this chapter](#). We will find links at the end of it.



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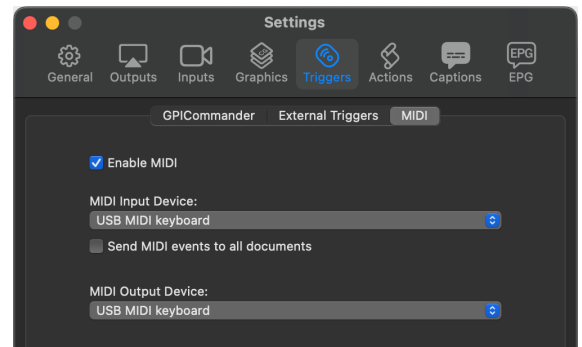
## 13.11. Control with MIDI

One of the lesser known features in OnTheAir Video is the MIDI control feature. OnTheAir Video's MIDI Control allows you to assign a MIDI note to buttons and clips.

MIDI devices are automatically detected when attached to a system, so you only need to plug in the device and you can use the feature immediately. The simplest way to test this feature is to start with a simple MIDI keyboard. M-Audio, Roland and a variety of manufacturers have USB keyboards that are both inexpensive and packed with options. Once the MIDI keyboard is attached to the computer, open OnTheAir Video.

Then go to the MIDI Settings of OnTheAir Video. You can set:

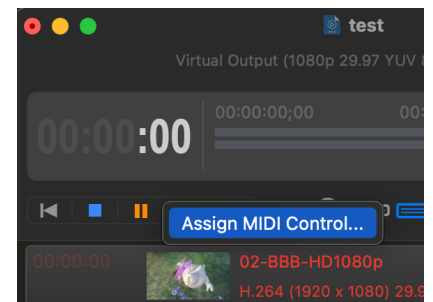
- **The MIDI input device:** the device that you use to control OnTheAir Video. It will send MIDI triggers to OnTheAir Video and OnTheAir Video will play, stop clips when it receives these triggers.
- **The MIDI output device:** the device to which OnTheAir Video will output a MIDI note when specific clip will start playing.



### 13.11.1. Control Playback with MIDI

#### Assign a MIDI Control to a button:

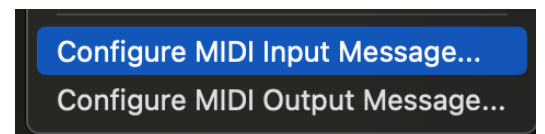
You can assign a MIDI note to a button if you want to control the generic playback control such as play, pause, or even put a playlist in loop. For that, right-click on any button and select "Assign MIDI Control..."



#### Assign a MIDI Message to a clip:

Instead of assigning to a button, you can assign a MIDI Message to a clip directly, so you will control the playback of that specific clip. For that, right Click on a clip and select:

- **"Assign MIDI Input Message...":** Then simply hit a key on your MIDI device (make sure to have only unique notes for each clip, otherwise you won't know which one will start). That's it. Now if you press again that MIDI note, the clip will start playing, and continue with the standard behavior of the playlist (if it's in chain, it will continue playing the next clip, or stop at the end if it's not in chain,...)
- **"Assign MIDI output Message...":** You can automatically output a MIDI note when a specific clip starts playing, so you can control external devices with MIDI. Then enter manually a value for the Channel and Note. That's it, the next time the clip will play OnTheAir Video will output that note to the MIDI device selected in the settings.



To clear a MIDI note, right click on the clip or button and select "Clear MIDI Note". This will clear both the input and output MIDI notes.



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## 14. Traffic Option

Not available in OnTheAir Video Express.

[The OnTheAir Video 4 traffic option](#) brings a host of features. Here are some of the features that it brings:

- **Wide Orbit integration:** open Wide Orbit (WOS) playlists
- **Media Browser:** add support for a local or remote media browser
- **BXF:** add support for BXF files to automatically create "segments" in the Media Browser
- **Folder-based schedule:** create one playlist per day, and simply place it in a folder using the appropriate name
- **Remote Control:** allow to control or monitor OnTheAir Video remotely, with also the ability to do "gang playback control"
- **"Virtual" sources:** Which are live sources with some preset attributes (actions, GPI trigger, etc...)
- **Process purge lists:** import .DAT files to know which clips should be deleted from disk

This option is made for an extensive use of the [scheduler](#) and the [playlist](#) system, using Wide Orbit integration. We will not go further in this User Manual, which is designed to introduce you to the basics of OnTheAir Video 4.

If you are looking for more information, you can find links to:

- Our website article "[About the "Traffic" option of OnTheAir Video 4](#)"
- Our Youtube video "[OnTheAir Video - Traffic Integrations](#)"
- Our Youtube Video "[Master Control with OnTheAir Video Traffic Option](#)"



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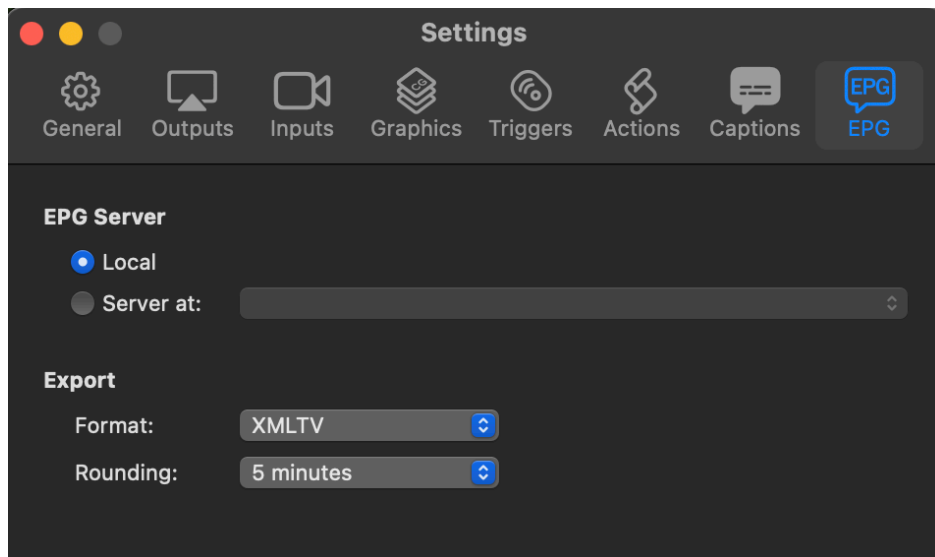
## 15. EPG Option

To use EPG Tags in OnTheAir Video, you need the EPG option. **Not available in OnTheAir Video Express.**

This option allows you to add the support for EPG (Electronic Program Guide) to a OnTheAir Video license. A useful tool to determine the list of current and scheduled programs, with information and details for each program on your channel. On each clip you can add info such as a title, category, etc. You can then export that info into an XML file.

### 15.1. Setting Up

Go to the top menu "OnTheAir Video > Settings... > EPG":



In this panel, you can select your EPG server as:

- **Local:** on your local machine.
- **Server at:** for multiple instances. You can add a new server with an IP address. It means you share the EPG tags setup (categories, custom ratings...) on the same server.

You can also change the settings for your EPG export:

- **Format:** you can choose between XMLTV or TV Guide for your files.
- **Rounding:** you can choose between none, 1 minute and 5 minutes.

More information about the export at [the end of this chapter](#).





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## 15.2. EPG Window

To open this window, go to the top menu “Window > EPG Tags”. You will find three panels:

### 15.2.1. EPG Tags

It is where you can create a new EPG tag and set information about a program:

The screenshot shows the 'EPG Tags' window. On the left, under 'EPG Tags', there is a search bar and a table with the following data:

Unique ID	Title	Synopsis
NEWS	News	
SERIES	Series	
SHOW	Show	
WEATHER	Weather	

Below the table is a 'New EPG Tag' button. On the right, under 'EPG Information', there are several input fields: 'Unique ID' (filled with 'NEWS'), 'Air Date (YYYYMMDD)' (empty), 'Last Modification' (filled with '2024-04-08 08'), 'Modified By' (empty), 'Title' (filled with 'News'), 'Sub Title' (empty), 'Synopsis' (empty), 'Season' (empty), 'Episode Nr' (empty), 'Episode ID' (empty), 'Rating System' (dropdown menu), 'Categories' (empty), and 'Icon URL' (empty). A 'Save Changes' button is at the bottom right.

- **Unique ID:** A unique identifier set to your EPG tag when you create it.
- **Air Date:** Information about when the program is scheduled to be played.
- **Last Modification:** Is set each time changes are done to the Tag.
- **Modified By:** The ID of the last person that modified the Tag.
- **Title:** The name you give to the Tag.
- **Sub Title:** A secondary or explanatory title.
- **Synopsis:** A short description of the contents of the program.
- **Season/EpisodeNr/EpisodeID:** Set information related to a TV show or a TV series.
- **Rating System:** The TV Parental Guideline, different between countries. You can set the info between V-Chip, MPAA or Other (it will not affect the OnTheAir Video playout).
- **Rating Value:** A value related to your Rating System (PG-13 in the USA for example). You can create presets through the Ratings Window.
- **Categories:** The category of your program (Movie, Sport, News...). You can create presets through the Categories Window.
- **Icon URL:** to add an Icon to your program.

Click on "Save Changes" to save your new tag.

All the tags you create are shown in the "EPG Tags" list. If you want to modify the information of a tag, click on it, modify and click again on "Save Changes", it will automatically modify your tag wherever it is located.



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Click on "Reload" to refresh the EPG tags Window.

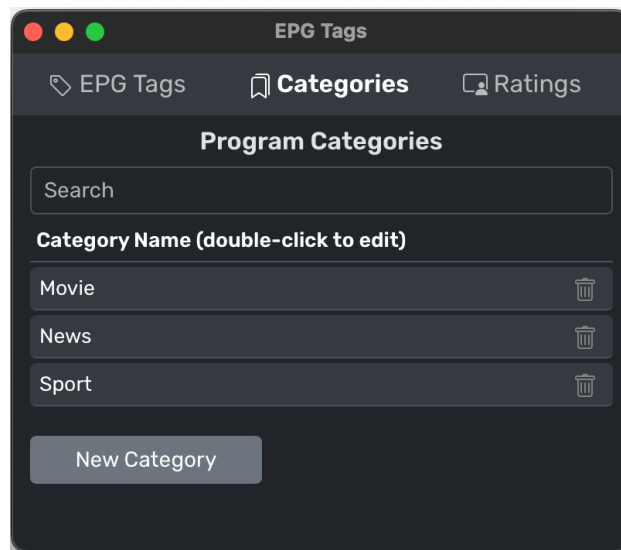


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## 15.2.2. EPG Categories

You can set multiple Category Names for your programs:

- Just click on New Category to add a new one. Double-click to edit one you already added and press on the Trash to delete it.
- You can add as many Category Names as you want. Click on Search to find one with the name you are looking for.
- On The EPG Tags window, when you set the Categories, a small window will appear with the Category names you created. **It saves time when you create a new EPG Tag.**

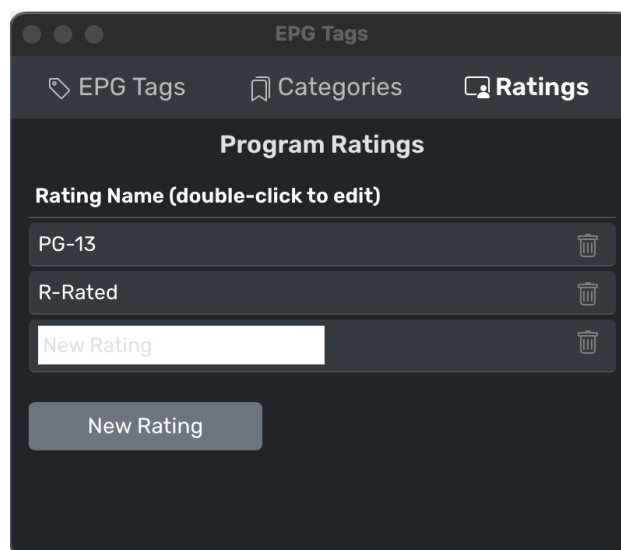


## 15.2.3. EPG Ratings

Same logic with the EPG Ratings Window —

you can preset Rating Names to save time when you create an EPG Tag.

- You can add a new Rating name. Double-click to edit it or the Trash to delete it.
- You can add as many Rating Name as you want.

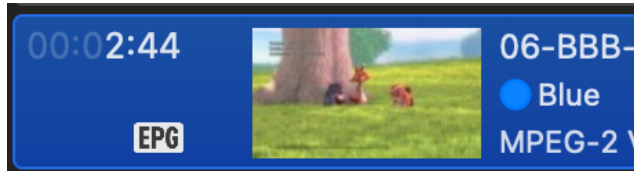




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## 15.3. Add/Remove an EPG Tag to a Clip

Just drag and drop the tag to the clip in the playlist. When it is done, you will see an EPG logo added to the clip in the playlist.

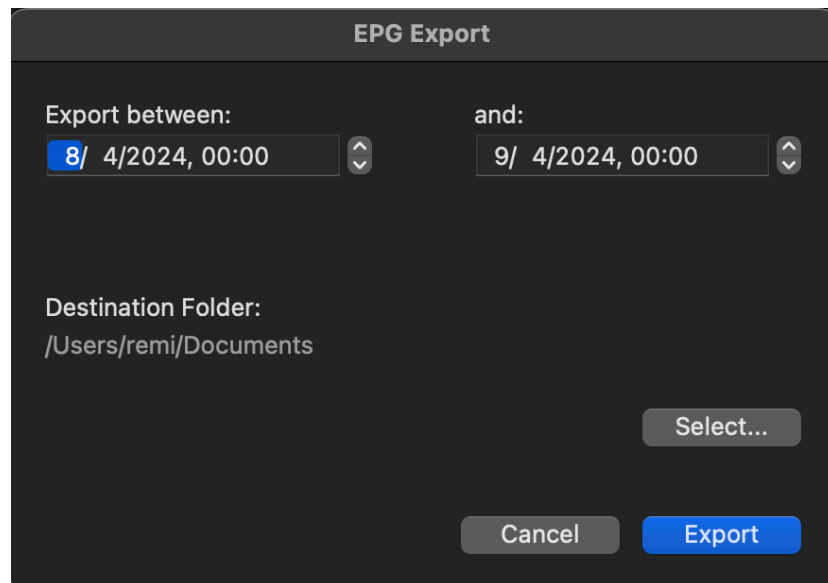


- If you want to remove an EPG tag from a clip, open the contextual menu with the right click and “EPG > Clear EPG Tag from Selected Clips”
- If you click on “EPG > Show EPG Tag”, it will open the EPG window.

## 15.4. Export EPG

You can export your EPG tags in OnTheAir Video with a XMLTV or a TV guide format. It will automatically detect all the EPG tags and their information in the clips from a schedule.

To export EPG, go to the top menu “File > Export EPG...”. This window will pop:



You can set:

- **Export between - and:** Select the date and the hour of the beginning and the end. The export will only contains the EPG tags in between.
- **Destination Folder:** To select where the export file is stored.



## 16. List of Keyboard Shortcuts

**Note:** On some keyboards "option" is indicated as "alt", "command" is indicated as "cmd" and "control" is indicated as "ctrl".

Keystroke	Action
<b>File</b>	
command + n	New Playlist
⇧ + command + n	New Folder-Based Playlist
command + o	Open Playlist...
command + r	Check for Missing Clips
option + command + r	Validation Report...
command + w	Close Window
command + s	Save Playlist...
⇧ + command + s	Duplicate
<b>Add</b>	
option + ⇧ + a	Media Files...
option + command + a	Clip by ID...
option + ⇧ + l	Live Clip...
option + ⇧ + o	Offline Clip...
option + ⇧ + c	Comment
<b>Window</b>	
command + i	Clip Inspector
⇧ + command + p	Output Preview
⇧ + command + l	Activity & Logs
⇧ + command + y	Stream Deck
⇧ + command + m	Media Browser
⇧ + command + v	Virtual Sources
⇧ + command + t	Transition Editor
command + t	New Timing Window
<b>Document Edition / Navigation</b>	
command + z	Undo



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Keystroke	Action
⇧ + command + z	Redo
command + x	Cut
command + c	Copy
command + v	Paste
command + d	Duplicate
command + a	Select All
command + p	Now Playing
option + command + p	Go To Play Next
⇧ + command + r	Randomize Playlist
⇧ + command + j	Join in progress
command + f	Find...
command + g	Find Next
⇧ + command + g	Find Previous
option + command + up	Select First Clip in playlist
option + command + down	Select Last Clip in playlist
up	Select Previous Clip
down	Select Next Clip
option + C	Set Chain mode on/off
option + L	Set Loop mode on/off
option + Q	Sert Cue Mode on/off
option + K	Set Key mode on/off
<b>Scheduling</b>	
command + ⇧ + o	Open Schedule
command + r	Reload the current schedule
control + command + s	Show the Schedule Window
option + command + s	Save Schedule
<b>Playback control in Playlist</b>	
⇧ + left	Go 1 second earlier
⇧ + right	Go 1 second later
⇧ + ctrl + left	Step backwards



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Keystroke	Action
⬆ + ctrl + right	Step forward
k	Pause
s	Stop
option + left	Skip to previous
option + right	Skip to next
option + command + left	Go to 5 seconds before the end of the previous
option + command + right	Go to 5 seconds before the end of the current
space bar	Toggle play/pause playing clip
option + space bar	Force play selected clip
<b>Playback Control in Inspector</b>	
left	Go 1 frame earlier
right	Go 1 frame later
⬆ + left	Go 1 second earlier
⬆ + right	Go 1 second later
option + left	Go to end of clip
option + right	Go to beginning of clip
space bar	Play/stop/pause
<b>Clip Edition in Inspector</b>	
i	Set in point
o	Set out point
⬆ + i	Go to in point
⬆ + o	Go to out point
option + i	Clear in point
option + o	Clear out point
option + x	Clear in and out points



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## 17. When Something Goes Wrong...

While we strive to ensure that OnTheAir Video be as stable a platform as is humanly possible, there is a lot of interaction between our software and other pieces of your workflow (your MacOS, video card drivers, switchers, etc.), and so we must constantly evolve our product to adapt to changes made in those applications. As such, bugs do sometimes sneak up on us. Should any issues arise while utilizing OnTheAir Video the first place to look for answers to potential causes is our white pages on our Softron Support Desk website.

Keeping an eye on the **Performance Gauges** in the Activity & Logs window (accessed via “Window > Show Activity & Logs Window”) is also a valuable resource.

The Performance Gauges show the performance of your computer as it runs the application, and may prove a useful indicator as to what could be causing issues. See our [Troubleshooting: The Log Window Explained](#) article for details.

And also keep in mind that for the life of the product, your application includes our support service. The best way to reach us is via “Help>Contact Support” in the user interface of the application (see below for image). Through that button you can collect the technical logs from the application and open a support ticket on our Support Desk. It is important that when opening a ticket that you supply as much information as possible, including the date and time of the incident(s).

