

VIDEO REQUIREMENTS

PREFERRED FORMATS

- DNx145, 220 or 220x files
- XDCam 422 files with a MXF OP1a wrapper

RESOLUTION

- 1920 x 1080, 4:2:2

FRAME RATE

- 29.97 / 59.94, MPEG-2 Long GOP @ 50 Mbps

FILE ORDER

- Upper field first (TFF)

TIME CODE

- Drop Frame
- Starting Time code should be (01:00:00;00 or 00:00:00;00)

ADDITIONAL ACCEPTED FORMATS (but not preferred)

- Apple ProRes 422
- Apple ProRes 422 HQ

RESOLUTION

- 1920 x 1080, 4:2:2

FRAME RATE

- 29.97 / 59.94

Your program should start and end with one frame of black.

AUDIO REQUIREMENTS

FORMATS

- Programs can be delivered to NETA as Stereo or 5.1 surround.
- Audio must be free of clipping and distortions and cannot lead or lag video by more than a half frame.

LOUDNESS

- Average levels of -24LKFS +or-2dB
- Programs may have music or effects true-peak levels as high as -2 dBFS during moments of dramatic impact, as long as average dialog levels are maintained

AUDIO ESSENCE

- PCM Uncompressed
- Audio Format: 48 KHz sample rate, uncompressed
- Peak audio program levels at -12 to -8 dBFS, nominal peak levels -10dBfs, average audio levels should be around -20 dBFS.
- Nominal Loudness level: -24 LKFS plus or minus 2 dB.
 - Loudness is measured using ITU BS.1770-3 weighting for the duration of the show.
- Audio Ancillary
- 24 Bit
- 48 KHz sampling rate
- 1152 kbps Bitrate

AUDIO REQUIREMENTS (CONT'D)**STEREO**

- Stereo content that does not have DVI or SAP, should be delivered to NETA with 2 channel audio as noted below.
 - Channel 1 Stereo Left
 - Channel 2 Stereo Right
- Stereo content that does have DVI or SAP, should be delivered to NETA with 8 channel audio as noted below.
 - Channel 1 Stereo Left
 - Channel 2 Stereo Right
 - Channel 3 Silence
 - Channel 4 Silence
 - Channel 5 Silence
 - Channel 6 Silence
 - Channel 7 DVI (silence if none)
 - Channel 8 SAP (silence if none)

5.1 SURROUND

- 5.1 Surround that does not have DVI or SAP, should be delivered to NETA with 6 channel audio as noted below.
 - Channel 1 Left Front
 - Channel 2 Right Front
 - Channel 3 Center
 - Channel 4 Low Frequency Effects
 - Channel 5 Left Surround
 - Channel 6 Right Surround
- 5.1 Surround that does have DVI or SAP, should be delivered to NETA with 8 channel audio as noted below.
 - Channel 1 Left Front
 - Channel 2 Right Front
 - Channel 3 Center
 - Channel 4 Low Frequency Effects
 - Channel 5 Left Surround
 - Channel 6 Right Surround
 - Channel 7 DVI (silence if none)
 - Channel 8 SAP (silence if none)

STEREO SYNTHESIS

Stereo synthesizing is not allowed within any content at any time.

UP-MIXING

When up-mixing two channels (stereo) to multi-channel surround sound (5.1 channel), audio must be properly distributed among the channels. The resulting center image should not be spread from center. Up-mixed audio must be downmix-compatible to stereo and mono, that is, the resultant downmix should be virtually indistinguishable from the original.

CLOSED CAPTIONING REQUIREMENTS

Closed Captioning should be embedded on your program media but a .SCC synchronous file is also acceptable. Please ensure your 708 captions contain 608 compatibility bytes. The display of Closed Captioning should be in sync with the program audio to the extent possible based on required display time needed to read the captions and speed of the speech. Captions should normally appear within plus or minus 1 second of the spoken word. Please ensure captions do not obscure critical video content (i.e. name keys, text on screen, faces, or important action).

Any program with embedded captions must have CDP 608 Captions. We will not be able to accept files that only have 708 captions.

Specify if the captions are Embedded or Sidecar

CONTENT WITH ENGLISH CAPTIONS AND SPANISH CAPTIONS

- Content that includes English captions and Spanish captions, the closed captions must be provided as two separate sidecar files (no captions can be embedded in the video).
- The English .scc sidecar filename must match the video filename exactly.
- The Spanish sidecar .scc file will need to match the name of the video file with _SP (underscore, uppercase S and uppercase P) included at the end to note Spanish captions.
- Example:
 - Video File = netashow.mxf
 - English Caption = netashow.scc
 - Spanish Caption = netashow_SP.scc

CLOSED CAPTIONING ESSENCE

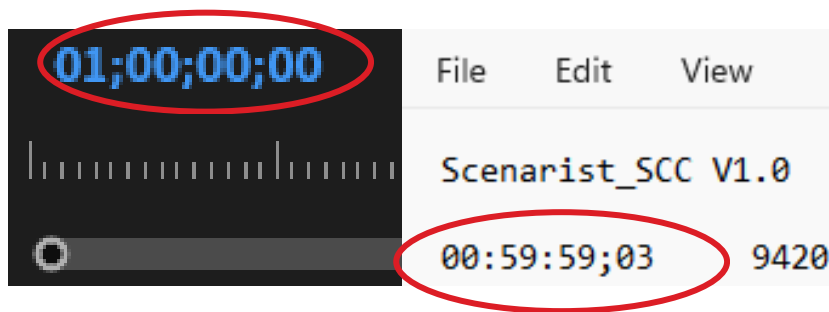
- SMPTE436M Ancillary data track containing 708 captions with 608 compatibility bits (preferred).
- 708 captions with 608 compatibility bits embedded in the VANC (Alternate).

You may submit test files prior to routine submission. File lengths should be no less than 2 minutes and no more than 10 minutes in duration.

CLOSED CAPTIONING REQUIREMENTS (CONT'D)

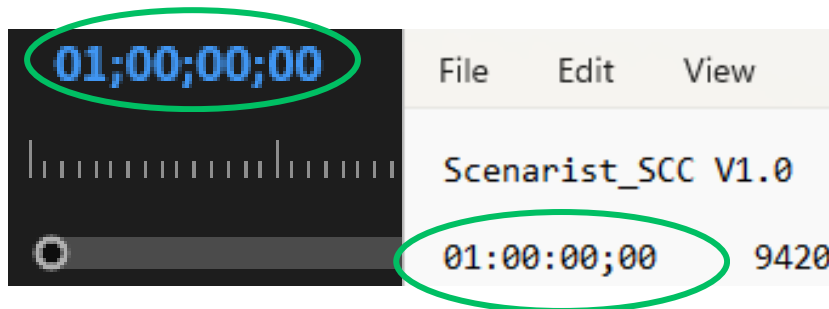
If delivering a Sidecar closed caption file, it must be a .scc file. Any other closed caption file types cannot be processed:

- Make sure the time code on the .scc file start time matches the start time code of your video file.
- If the two files do not start with the same time code, they will not align, and the captions will not be in sync with the audio. This will make the closed captions non-compliant with current FCC guidelines.



The start time of this .scc file is different than the time code on the video file.

When these files are put together, the captions will not be in sync with the audio.



The start time of this .scc file is the same as the time code on the video file.

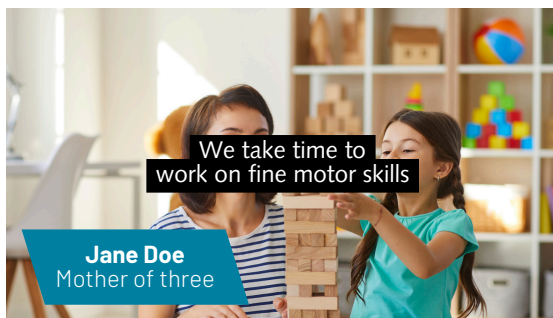
When these files are put together, the captions should be in sync with the audio.

CLOSED CAPTIONING REQUIREMENTS (CONT'D)

Make sure the closed captions do not cover up graphics (name keys, text on screen), faces or important action. This ensures compliance with current FCC guidelines.



This caption covers up a name key and is **non-compliant** with current FCC guidelines.



This caption covers a face and is **non-compliant** with current FCC guidelines.

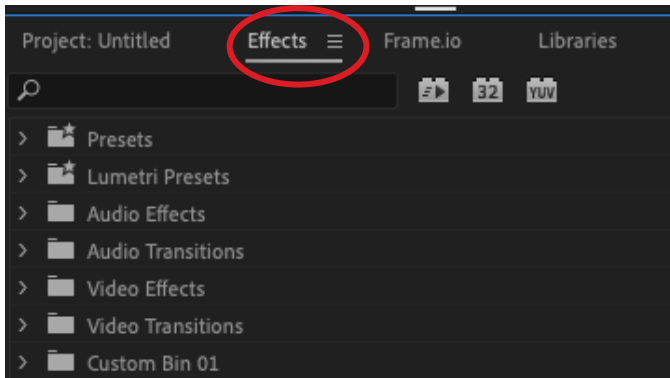


Moving the caption to the top of the screen for the duration of the lower third graphic will make it **compliant** with current FCC guidelines.

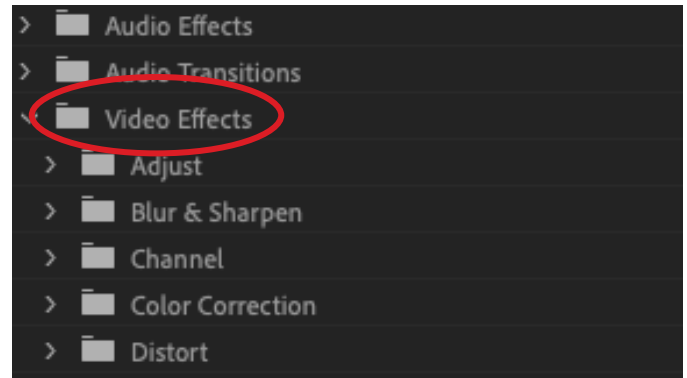
TIPS FOR FIXING YOUR LEVELS

What happens when you submit your program and our uplink says that your levels exceed 100 IRE or fall below 0? Our recommendation for fixing in Premiere Pro:

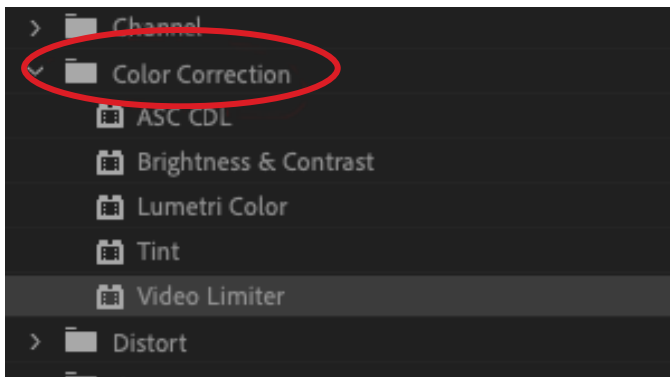
LEVELS EXCEED 100 IRE



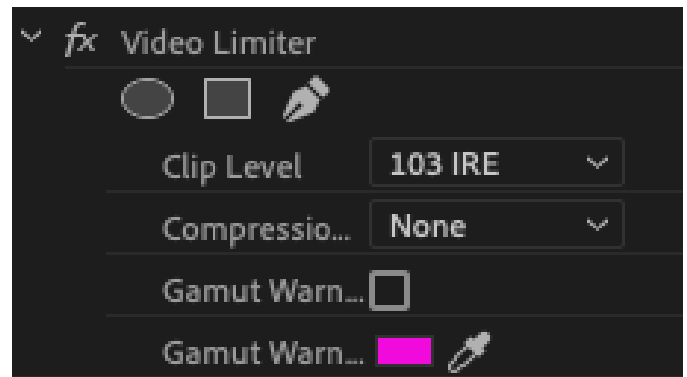
Click on Effects



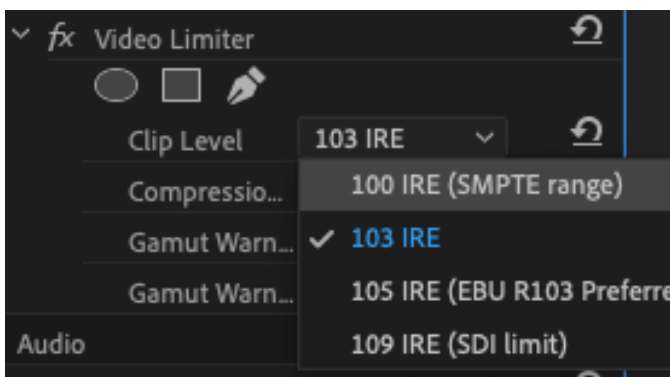
Click on Video Effects



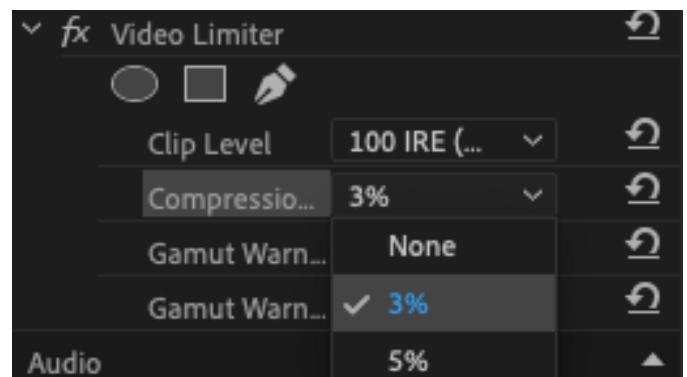
Click on Color Correction, then Video Limiter



You will likely see that the video has defaulted to 103 IRE. Click on the dropdown menu



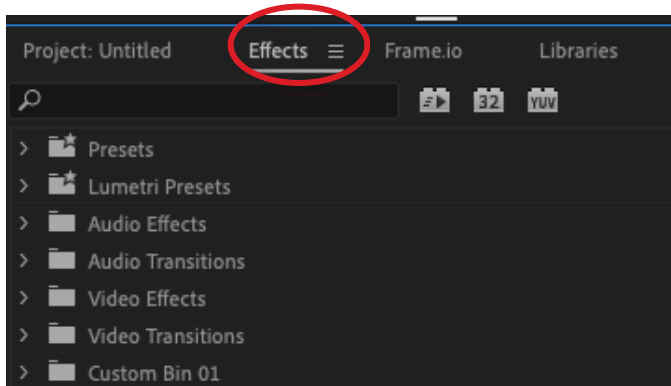
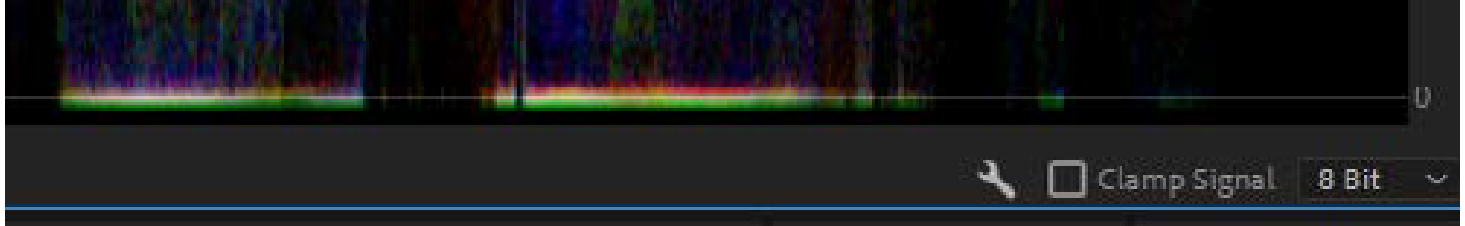
Select 100 IRE (SMPTE range)



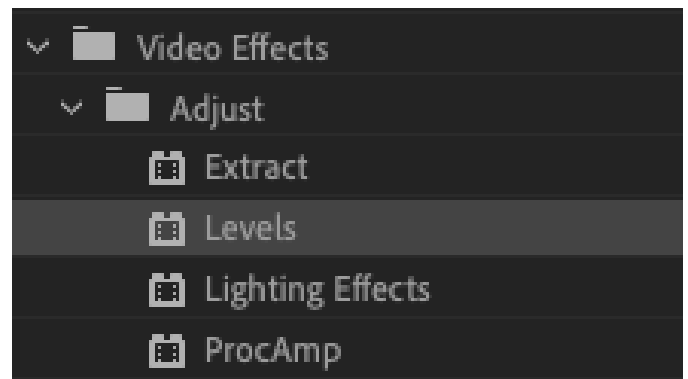
To buy a little extra padding, click on the next dropdown menu and change it from 0 to 3%

TIPS FOR FIXING YOUR LEVELS (CONT'D)

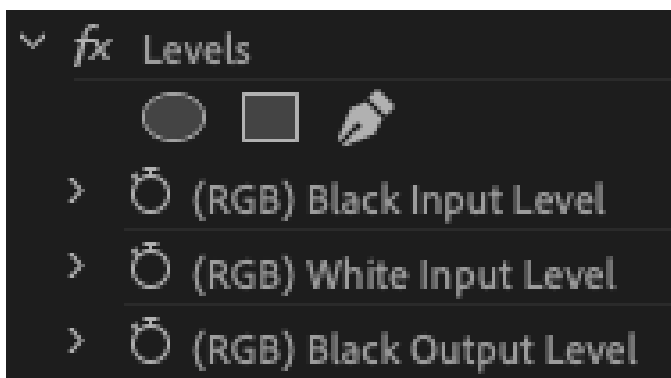
LEVELS FALL BELOW 0 IRE



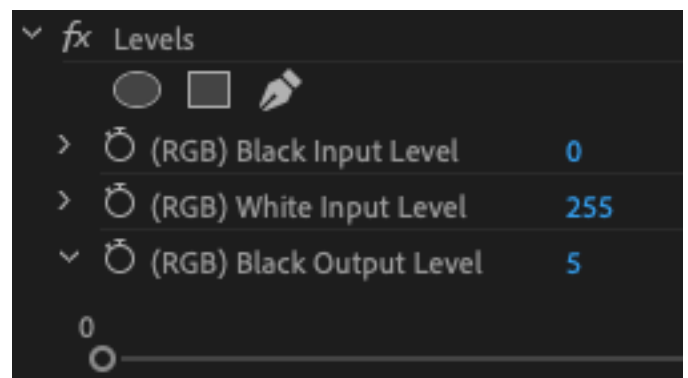
There are probably a lot of ways to adjust the bottom



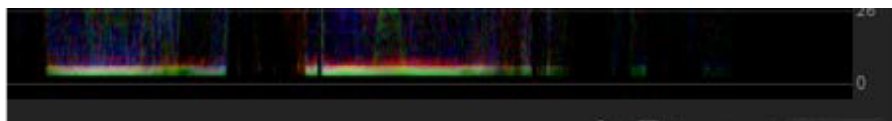
Click on Video Effects, then Adjust, then Levels



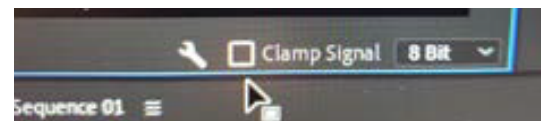
Click on the arrow next to RGB Black Output Level. A horizontal slider bar should appear below it.



Slide the dot on the bar until the reading is at 5



Check your scope – this should bring the video above 0 IRE. If it does not, adjust the bar a little higher.



Tip: At the bottom of the waveform scope, there is a check box called Clamp Signal. Make sure this is NOT checked. Otherwise, the scope will artificially make your levels look like they are within parameters when they are not.