



io XT

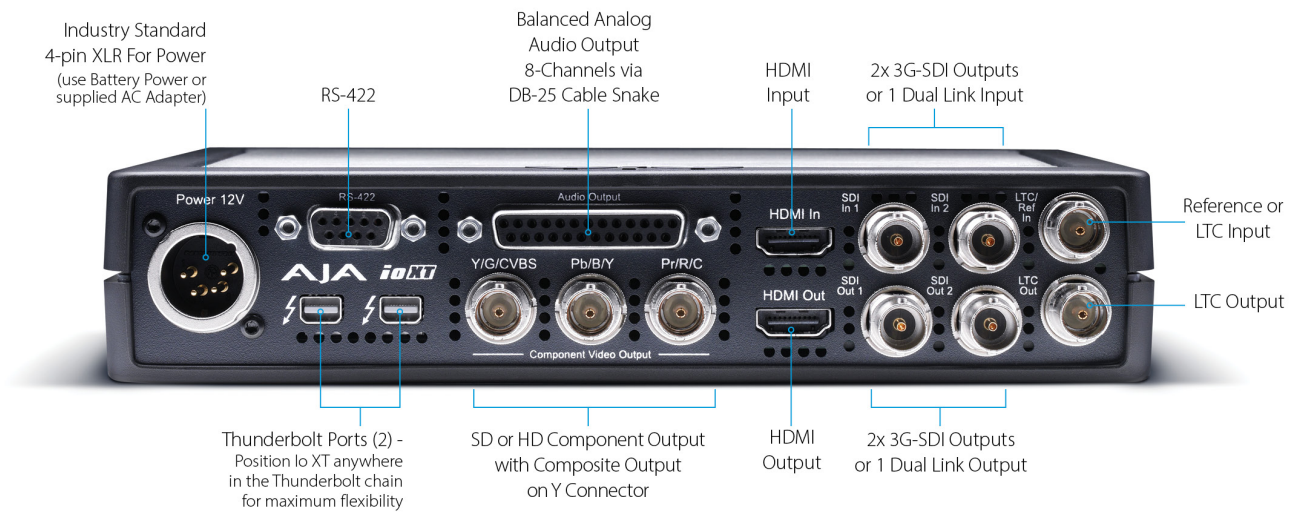
io XT is no longer available. Please visit: <https://www.aja.com/family/mobile-io> for current alternatives.

\$ US MSRP

io XT is the ideal portable companion for lightning fast video capture and playback for professional post production and on set applications.

Compact, portable and powerful, io XT is loaded with high-end features including 3G/Dual Link/HD/SD-SDI, Component Analog, and HDMI connectivity, to bring true desktop level power to any Thunderbolt enabled system, with full uncompressed HD and SD 4:2:2 and 4:4:4 capable video and audio connectivity.

<https://www.aja.com/index.php/products/io-xt>



Video Format

- (2K) 1080p 23.98, 24, 25
- (2K) 1080PsF 23.98, 24, 25
- (HD) 1080i 50, 59.94, 60
- (HD) 1080PsF 23.98, 24, 25, 29.97, 30
- (HD) 1080p 23.98, 24, 25, 29.97, 30, 50, 59.94, 60
- (HD) 720p 23.98*, 24*, 25*, 29.97*, 30*, 50, 59.94, 60
- (SD) 625i 50
- (SD) 525i 23.98*, 59.94

*These formats are dependent on specific software functionality and are not normal over the wire formats

Video Input Digital

- 3G-SDI, SMPTE 425
 - RGB 4:4:4 8-bit, YCbCr 4:2:2 10-bit
- 1.5G-SDI, SMPTE 292M
 - Single Link HD-SDI YCbCr 4:2:2 10-bit
 - Dual Link RGB 4:4:4 8-bit, Dual-Link YCbCr 4:2:2 10-bit
- 270 Mbps SDI, SMPTE 259M-C
 - YCbCr 4:2:2 10-bit, 8-bit
- HDMI v1.3
 - 30-bits/pixel, RGB or YUV, 2.25 Gbps
 - 1D LUT Support (Mac and PC)

Video Output Digital

- 3G-SDI, SMPTE 425
 - RGB 4:4:4 8-bit, YCbCr 4:2:2 10-bit
- 1.5G-SDI, SMPTE 292M
 - Single Link HD-SDI YCbCr 4:2:2 10-bit
 - Dual Link RGB 4:4:4 8-bit, Dual-Link YCbCr 4:2:2 10-bit
- 270 Mbps SDI, SMPTE 259M-C
 - YCbCr 4:2:2 10-bit, 8-bit
- HDMI v1.4
 - 30/36 bits/pixel, RGB or YUV, 2.25 Gbps

Video Output Analog

- Composite/S-Video (Y/C) (1x BNC/2x BNC+adapter)
- NTSC, NTSCJ, PAL
- Component (3x BNC)
- HD: YPbPr, RGB
- SD: YPbPr, RGB (component mode)
- SMPTE/EBU N10, Betacam 525 line, Betacam 525J, RGB
- 12-bit D/A, 8x oversampling
- +/- .2 dB to 5.0 MHz Y Frequency Response
- +/- .2 dB to 1 MHz C Frequency Response
- .5% 2T pulse response
- <1% Diff Phase
- <1% Diff Gain
- <1 ns Y/C delay inequity

Audio Input Digital

- 16-channel, 16 and 24-bit SMPTE-259 SDI embedded audio, 48 kHz sample rate, synchronous
- 8-channel, 16 and 24-bit HDMI embedded audio, 48 kHz sample rate, synchronous

Audio Output Digital

- 16-channel, 16 and 24-bit SMPTE-259 SDI embedded audio, 48 kHz sample rate, synchronous

- 8-channel, 16 and 24-bit HDMI embedded audio, 48 kHz sample rate, synchronous

Audio Output Analog

- 8-channel, 16 and 24-bit D/A analog audio, 48 kHz sample rate, balanced, using industry standard 8x XLR on DB-25 breakout cable (Breakout cable NOT included)
- +24 dBu Full Scale Digital (0 dBFS)
- +/- 0.2 dB 20 to 20 kHz frequency response

Downstream Keyer

- Supports graphics with alpha channel over video, matte or framebuffer, or framebuffer content over incoming video or matte

Up-Conversion

- Hardware 10-bit
- Anamorphic: fullscreen
- Pillarbox 4:3: results in a 4:3 image in center of screen with black sidebars
- Zoom 14:9: results in a 4:3 image zoomed slightly to fill a 14:9 image with black side bars
- Zoom Letterbox: results in image zoomed to fill full screen
- Zoom Wide: results in a combination of zoom and horizontal stretch to fill a 16:9 screen; this setting can introduce a small aspect ratio change

Down-Conversion

- Hardware 10-bit
- Anamorphic: fullscreen
- Letterbox: image is reduced with black top and bottom added to image area with the aspect ratio preserved
- Crop: image is cropped to fit new screen size

Cross-Conversion

- Hardware 10-bit
- 1080i to 720p
- 720p to 1080i
- 720p to 1080PsF

SD to SD Aspect Ratio Conversion

- Letterbox: This transforms SD anamorphic material to a letterboxed image
- H Crop: Will produce a horizontally stretched effect on the image; transforms anamorphic SD to full frame
- SD Pillarbox: Will produce an image in the center of the screen with black borders on the left and right sides and an anamorphized image in the center
- V Crop: Will transform SD letterbox material to an anamorphic image

Reference Input or LTC Input

- 1x BNC assignable to Reference video or LTC input

Reference

- Analog Color Black (1V) or Composite Sync (2 or 4V)
- Nonterminating

Electrical Interface

- Thunderbolt 1 (2x)

Machine Control

- RS-422, Sony 9-pin protocol
- 9-pin D-connector pinout is as follows:

1	GND
2	RX-
3	TX+
4	GND
5	No Connection
6	GND
7	RX+
8	TX-
9	GND
Shell	GND

Size (w x d x h)

- 8.74" x 7.09" x 1.65" (222.0 x 180.09 x 41.91 mm)

Weight

- 1.8 lbs (0.8 kg)

Power

- 10-20V, 18W typical, 22W max

Environment

- Safe Operating Temperature: 0 to 40 C (32 to 104 F)
- Safe Storage Temperature (Power OFF): -40 to 60 C (-40 to 140 F)
- Operating Relative Humidity: 10-90% noncondensing
- Operating Altitude: <3,000 meters (<10,000 feet)