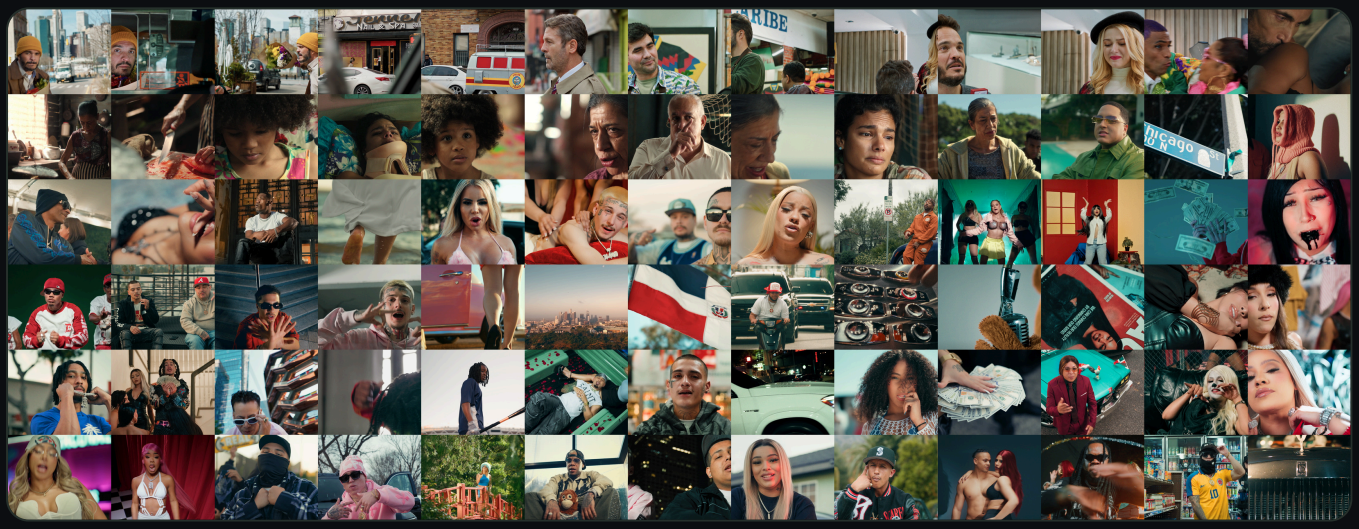
PRACTICAL GUIDE

Monitor for FX3

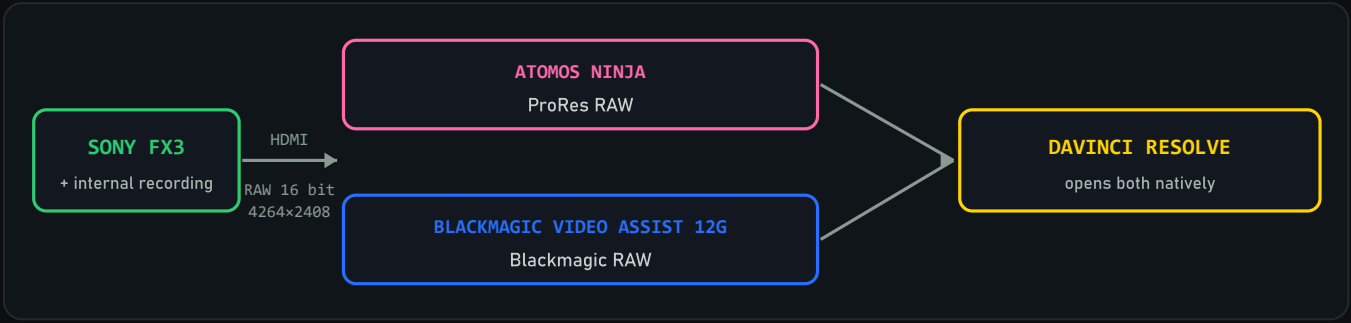
Ninja RAW, Ninja TX / TX GO and Video Assist 12G: what suits your FX3 and your colorist



by Luis Taveras · Colorist

What the FX3 sends over HDMI

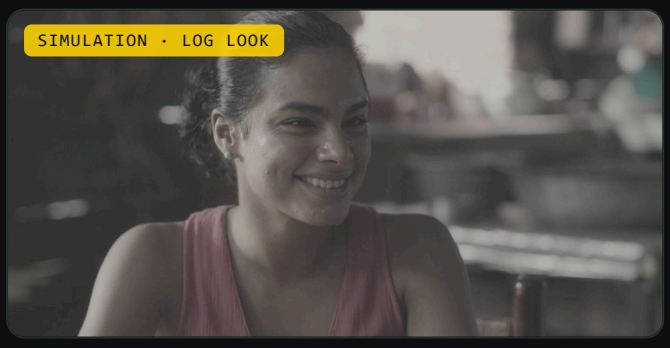
According to Sony, the FX3 sends a **16-bit RAW signal at 4264 × 2408** over its HDMI Type-A port, up to 59.94 fps, while it keeps recording XAVC and a proxy internally. With a compatible external recorder, that RAW is recorded as **ProRes RAW** or **Blackmagic RAW**.



Workflow illustration.

What is a RAW file?

- [ ] It's the sensor information **almost unprocessed**, before the camera decides color, contrast and sharpness.
- [ ] It gives **far more room in the grade**: white balance and ISO are adjusted later without degrading the image.
- [ ] **Not all RAW is equal.** Each format stores a different bit depth and compression, and each program reads them its own way.
- [ ] **The camera keeps recording internally**: those files work as a backup and a proxy for the editor.



This is how an ungraded log or RAW file arrives: flat and gray.



The same image finished in the grade.

Frames from *Madre* and *La Fábrica de Bodas*, color graded by Luis Taveras. Simulations are computed on frames from *Madre* and *La Fábrica de Bodas* (graded by Luis Taveras) to explain the effect; they are not tests of any specific camera.

The five monitors, side by side

Atomos and Blackmagic Design data. The three Atomos units share the same 1,500-nit screen; the Video Assists reach 2,500.

	NINJA RAW	NINJA TX GO	NINJA TX	VIDEO ASSIST 5" 12G HDR	VIDEO ASSIST 7" 12G HDR
Screen	5.2" · 1500 nits	5.2" 1920×1080 · 1500 nits	5.2" 1920×1080 · 1500 nits	5" 1920×1080 · 2500 nits	7" 1920×1200 · 2500 nits
Inputs	HDMI	HDMI	HDMI 2.0 + 12G-SDI	HDMI 2.0a + 12G-SDI	HDMI 2.0a + 12G-SDI
RAW from the FX3	ProRes RAW	ProRes RAW	ProRes RAW	Blackmagic RAW	Blackmagic RAW
Max RAW	6K 30p	6K 30p	8K 30p	depends on camera	depends on camera
Other codecs	ProRes, H.265	ProRes, Avid DNx, H.265	ProRes, Avid DNx, H.265, H.264	ProRes, DNxHR	ProRes, DNxHR
Media	CFexpress B, USB-C	—	—	1 UHS-II SD, USB-C	2 UHS-II SD, USB-C
Extras	No Wi-Fi or NDI	Wi-Fi · NDI 6 HX3	Wi-Fi · NDI 6 HX3 · AirGlu timecode	Embedded audio only	2 mini XLR with phantom
List price	699 USD	799 USD	999 USD	—	—

"—": data we couldn't confirm in official sources. Atomos list prices in US dollars at launch.

What matters with an FX3

- **The FX3 outputs HDMI**: you won't use the SDI on the Ninja TX or the Video Assists with this camera, but it's useful for sending a feed to the director or DIT.
- **The FX3 delivers 4264 × 2408 up to 59.94p**, below the maximum of any of the five. Check each brand's compatibility list for the exact modes.
- **Blackmagic RAW from the FX3** arrived with the Video Assist 3.22 update (November 2025), for the 5" and 7" 12G HDR models. The FX3 and FX30 are on the official list of supported cameras.

Frames from *Madre* and *La Fábrica de Bodas*, color graded by Luis Taveras.

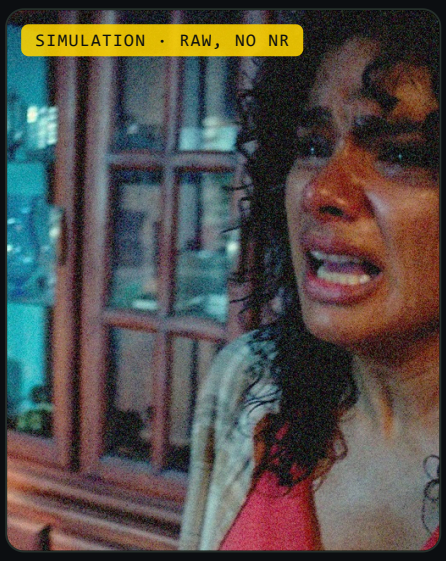
The difference nobody tells you about: noise

When you record RAW over HDMI, you get the signal without the internal noise reduction the FX3 applies to its XAVC files. That's why many people who move to ProRes RAW complain they see more noise. The format doesn't invent it: it's the sensor's real noise, which the camera used to hide.

- **FX3, ProRes RAW vs internal** (4K Shooters): a bit more noise in the RAW and a bit more detail. They recommend cleaning the noise in post.
- **Sony FX6 and a7S III** (CineD lab tests): ProRes RAW noise is finer and easier to clean than the blotches left by internal processing.
- **Blackmagic RAW:** in tests with other cameras it has looked cleaner than ProRes RAW from the start. For the FX3 we haven't yet found a published controlled test: run your own before the shoot.



Reference.



Real grain, detail intact: the colorist decides how much to clean.



Clean but pasty: the detail won't come back.

With ProRes RAW, the cleanup is your colorist's job

Budget and schedule time for it in the grade. Quality noise reduction is slow to render, but it's decided shot by shot and keeps the skin texture.

Frames from *Madre* and *La Fábrica de Bodas*, color graded by Luis Taveras. Simulations are computed on frames from *Madre* and *La Fábrica de Bodas* (graded by Luis Taveras) to explain the effect; they are not tests of any specific camera.

In the grading suite

ProRes RAW used to be a headache for anyone grading in DaVinci Resolve, which couldn't open it. Since version 20.2 (September 2025), Resolve opens it natively on macOS, Windows and Linux. Blackmagic RAW is still the house format.

PRORES RAW · ATOMOS

- [ ] Native in Final Cut Pro and, since 20.2, in DaVinci Resolve.
- [ ] More visible noise when opened, with more detail.
- [ ] Compact, very bright screen; the Ninja RAW is the cheapest of the three.
- [ ] If the edit is in Final Cut, it's the most direct path.

BLACKMAGIC RAW · VIDEO ASSIST

- [ ] DaVinci Resolve's house format: light and fast on the timeline.
- [ ] Full RAW controls inside Resolve: ISO, white balance and exposure.
- [ ] 2,500-nit screens, 5″ or 7″, with SDI and recording to SD or USB-C.
- [ ] If your colorist works in Resolve, it's the fastest workflow.

The LUT is for viewing, not for recording

Put the show LUT on the monitor to see something close to the result, but record clean RAW. If the LUT is baked into the file, the colorist loses the room RAW gave you.



Neon: where RAW gives room.



Skin finished in the grade.



Saturated colors that don't break.

Frames from *Madre* and *La Fábrica de Bodas*, color graded by Luis Taveras.

Which one is right for you?

1. **Your colorist works in DaVinci Resolve and you want a clean image and a fast workflow:** Video Assist 12G with Blackmagic RAW. The 7″ if it doubles as the director's monitor.
2. **You edit in Final Cut, or want the most compact and brightest:** Ninja RAW. It covers the essentials for an FX3.
3. **You need streaming, Wi-Fi or cloud proxies:** Ninja TX GO.
4. **You also work with SDI cameras or need wireless timecode:** Ninja TX.

Before you shoot: quick checklist

- [ ] **Update the firmware** on the camera and the recorder to the versions the manufacturer requires for RAW.
- [ ] **Run a 10-minute test**: record, check the file opens in your colorist's software and that no frames are dropped.
- [ ] **Also record internally** as backup and proxy, with the same timecode.
- [ ] **Expose for the RAW**: use the monitor's false color and waveform on the log signal, not on the LUT.
- [ ] **Hand the colorist** the RAW files, the internal files, the show LUT and a report with recorder, firmware, ISO and white balance.

The golden rule

Choose the recorder based on where the film will be graded. Ask your colorist before you buy or rent.







Frames from *Madre* and *La Fábrica de Bodas*, color graded by Luis Taveras.



Luis Taveras

COLORIST

Luis Taveras is a colorist, member of the Colorist Society International, with five feature films and more than 500 music videos. His credits include *Madre: a dos centímetros de ti*, winner of five awards at the 2025 New York Dominican Film Festival, and *La Fábrica de Bodas*, which premiered at the United Palace in New York. For him, color is the last place where a film can still change its emotion, and the skin always has to feel true.

5	500+	10
feature films	music videos	years in the craft

What I do

- Color grading for film
- Music videos
- Commercials and brands
- Cinema mastering and delivery (DCP)

Member, Colorist Society International · ID 98523302

DGCINE Film Agent · SIRECINE AC-PTA 18224

Planning your next shoot?

I'd love to collaborate with you on the color of your next project. Write to me and watch my demo reel.

DEMO REEL	vimeo.com/1224666204	WEBSITE	luistaverascolorist.com
EMAIL	contact@luistaverascolorist.com	INSTAGRAM	@luistaveras.colorist
YOUTUBE	@LuisTaverasColorista	LINKEDIN	luistaveras-colorist
IMDB	nm18370016		

#sonyfx3 #proresraw #blackmagicraw #atomos #colorist #luistaverascolorist