



WHAT IF YOUR EDIT STARTED THE MOMENT YOU HIT RECORD?

How Automated SDI-Triggered Mirroring
and Always-On Capture Eliminate the
Post-Production Delay

Why Are We Still Waiting for Footage? What If Editing or Ingest Could Begin the Moment You Hit Record in the field?

Removing the Delay Between Capture and Edit Through Automated File Delivery

The Production Bottleneck: Speed vs. Quality

In the push to deliver content quickly, media professionals have long been forced to choose between two compromised workflows.

One option is to use the live stream coming from a camera or transmission device. This allows footage to reach the studio instantly, making it ideal for breaking news and real-time coverage. But that speed comes at a cost. Because the stream depends on network conditions, quality can fluctuate, resulting in visual glitches or lower resolution that may not hold up in post-production.

The alternative is to wait for the original footage recorded on the camera. This delivers the highest quality, but introduces delays. Footage has to be physically delivered or manually uploaded, creating a gap in the workflow that slows editing and pushes back delivery timelines.

The Solution: TVU Progressive Download

TVU Progressive Download removes the need to choose between speed and quality.

It combines the immediacy of live transmission with the reliability of a high-quality camera recording, allowing production teams to receive broadcast-ready footage while the camera is still rolling. Instead of treating the field as separate from the studio, it turns every camera into a direct extension of the ingest system.

The result is simple: footage is available faster, at full quality, and ready for editing almost immediately – without changing how crews work in the field.

How It Works: Dual Encoding + File-Based Transfer

At the core of Progressive Download is a dual-encoding system inside the TVU unit.

One encoder handles the live, low-latency stream for immediate viewing. At the same time, a second encoder creates a high-quality version of the footage being recorded on the camera.

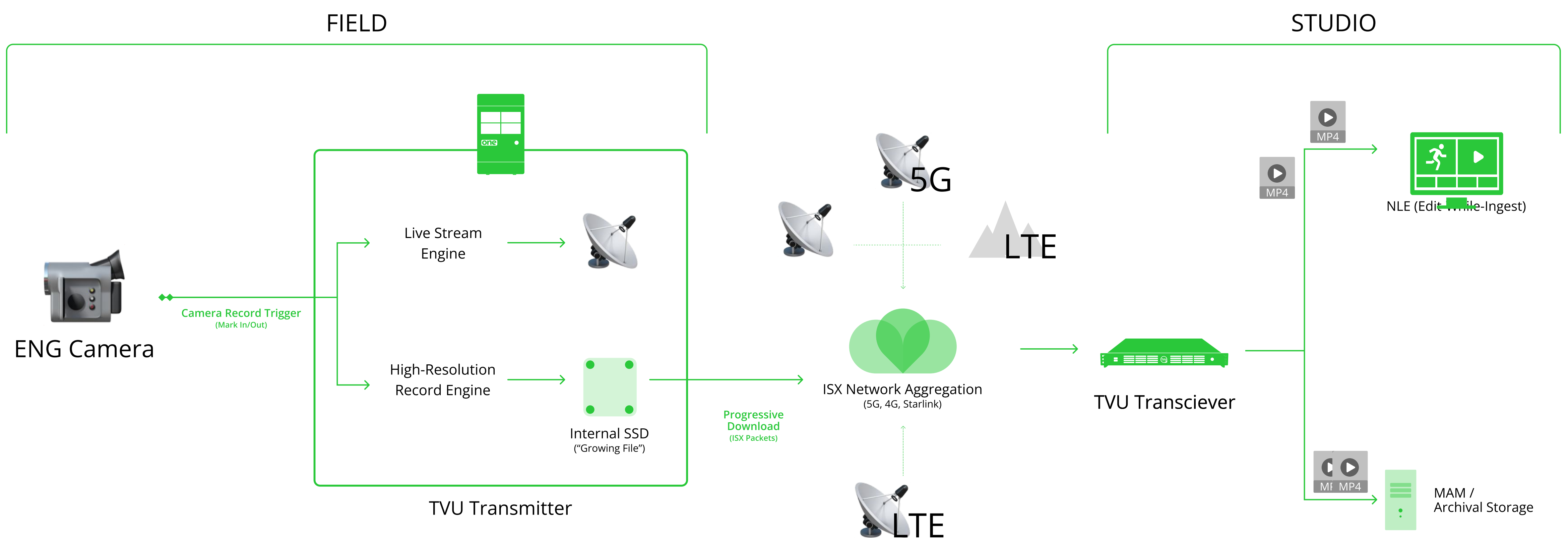
Adjustable High-Bitrate Recording: Teams can select a constant bitrate (CBR) encoding up to 20 Mb/s, depending on the needs of the production.

Native H.264 Format: Using the industry-standard H.264 codec ensures immediate compatibility with editing systems like Adobe Premiere, Avid, and DaVinci Resolve, as well as playout systems. This eliminates the need for time-consuming transcoding.

File-Based Transfer: Instead of sending a traditional video stream, the system transfers the recording as a file via ISX using multiple links to the TVU Transceiver.

Data Integrity: TVU's advanced error correction maintains the integrity of the file transfer, even under the worst network conditions. This ensures a complete, high-quality, ready-to-use file is ready to use immediately.

TVU Progressive Download Workflow: Field-to-Studio Path



The "Zero-Change" Field Experience

This technology is designed to fit seamlessly into existing workflows, so the crew doesn't have to change how they work.

There are no additional steps, no extra applications, and no need to manage the TVU transmitter during a shoot. When the camera operator presses "Record" as they normally would, the TVU unit automatically detects the SDI trigger.

From there, everything happens in the background. "Mark In" and "Mark Out" points are generated automatically, ensuring the studio receives a frame-accurate version that matches the camera's original recording.

The result is a fully automated process that requires no additional effort in the field, while delivering immediate value to the production team.

The "Always-On" Safety Net

Beyond capturing intentional shots, the TVU unit is always recording in the background. Even when the camera isn't actively rolling, the system continuously captures video using a rolling buffer (FIFO loop) on its internal storage. This creates a safety net for moments that might otherwise be missed.

If something important happens unexpectedly, producers can go back, find the moment, and retrieve it remotely from the TVU Transceiver without needing the original camera recording.

This gives production teams more confidence in the field, and ensures important moments are still available when they're needed most.

Strategic Impact: Efficiency Without Compromise

TVU Progressive Download changes how production workflows operate by removing one of the most time-consuming steps in the process: waiting for footage to arrive.

Record → Wrap → Ship → Ingest

to a parallel one:

Record + Ingest at the same time

Broad Applications Across the Media Landscape

1. News Acquisition and Global Distribution

In news, speed is critical, but quality still matters.

With TVU Progressive Download, high-quality footage arrives at the studio almost immediately and is ready for use. Instead of being stuck on a camera card in the field, files are centralized and accessible to editors, producers, and remote teams around the world.

2. Episodic Television and Filmmaking (Instant Dailies)

For scripted productions, waiting on dailies can slow down the entire day.

TVU Progressive Download allows producers and executives to review high-resolution footage as it's being captured – not after wrap. Editors can begin assembling scenes while production is still in progress, helping teams move faster without sacrificing quality.

3. Advertising and Commercial Shoots

In the fast-paced world of advertising, time is a critical expense.

With immediate access to high-quality footage, agencies can start building rough cuts, pull stills, and get client approvals while the set is still active. Adjustable bitrate settings up to 20 Mb/s ensure the footage meets the visual standards required for commercial work.

4. Non-Live Sports Coverage and Special Events

For highlight packages, sports documentaries, and behind-the-scenes coverage, quality is critical.

TVU Progressive Download makes high-quality highlights available within minutes for social media and broadcast use.

TVU Progressive Download makes high-quality highlights available within minutes for social media and broadcast use. It also provides a built-in safety net through the Always-On FIFO loop, allowing teams to go back and recover missed moments – even if the camera operator didn't capture them in real time.

By automating the capture and delivery of high-quality footage, it removes one of the most persistent bottlenecks in production without adding complexity. Field crews continue working exactly as they always have, while the studio gains immediate access to production-ready files.

This effectively turns every camera into a direct-to-studio ingest point. Whether covering breaking news, producing episodic content, or shooting a commercial, teams can begin working with high-quality footage in real time.

The result is a faster, more efficient workflow that values both speed and quality, giving production teams a meaningful advantage when timelines are tight and expectations are high.

Ready to simplify your content delivery workflow?

Discover how TVU Progressive Download can accelerate your pipeline and get your content where it needs to go faster.

Learn More.