

## Continental content creation: Dolby Vision and Dolby Atmos offer Europe's producers new pathways

For a business driven by clarity of vision, making content can be a murky business. What should be a simple task, taking work and getting it ready for delivery, gets ever more complex. Perhaps that was simple once - but today's mix of Hollywood, streaming services, and broadcasters, each with their own delivery spec, provides a real challenge. The market morphs constantly.

Delivering a great product - while staying on budget and on schedule - is no simple task. With co-productions becoming ever more common, you may find yourself needing to produce a variety of formats and deliverables on a single production. Thankfully, we developed Dolby Vision® and Dolby Atmos® with precisely these production challenges in mind.

Some people are surprised that unlike cinema, there's no licence fee or ongoing royalty for use of Dolby Vision and Dolby Atmos by production companies in broadcast. You do what you like. We're here if you need us, but you do not owe us anything.

### **A complete ecosystem offering quality, flexibility and cost-savings**

Dolby Vision and Dolby Atmos provide life-like experiences to end users, but they are much more than that. They are complete production ecosystems, enabling and simplifying your content production workflow, regardless of the end format or destination. With decades of collaboration with partners across the industry, we understand that exceptional technology must also be practical, usable, and economically viable. The Dolby Vision master is the mezzanine file for all other deliverables, simplifying your inventory and delivery to all distribution channels.

Dolby Vision and Dolby Atmos are both flexible and scalable. There is a vast and growing ecosystem of consumer end-point devices for content consumption, with wide-ranging capabilities, so our technology is designed to ensure the best possible version of your content is delivered, regardless of the end-point device. Using metadata created during post-production, and carried in the master file, we can scale Dolby Vision and Dolby Atmos experiences in order to present content as close to the original creative intent as possible, given the capabilities of the consumer device. If a TV can't go as bright as the grade monitor could, Dolby Vision scales back to what it detects the TV can handle. If there are fewer speakers than the mixing studio had, no problem, Dolby Atmos renders the audio for the number of speakers available. Each device enabled with Dolby Vision and Dolby Atmos technology understands enough about its own configuration and the interpretation of embedded metadata to make optimal use of your content.

So, great, you're delivering a Dolby Vision or Dolby Atmos master! But you'll invariably still have various other formats to deliver too, to satisfy the need of those distributors and consumers not yet able to accept content in Dolby Vision or Dolby Atmos. That's reality, so Dolby technologies are designed to be flexible, in that they can quickly and easily be used to create standalone deliverables, in all of those additional formats, with minimal additional effort.

### **How does this work in practice?**

Working primarily in the Dolby Vision and Dolby Atmos ecosystems means that you can leverage all that the two formats have to offer, as well as making the down-conversion process as painless as possible. The 'recipes' for creating the other versions are also held in the metadata, created during post-production, meaning you are better able to maintain creative consistency across versions.

Dolby Vision works by seeing HDR as the master content, the one that can and should be the best version possible, and downscaling to SDR, if you understand the rules, can be a straightforward process.

The same is true of Dolby Atmos. Here, you mix for three-dimensional space, a process that gives you much more room to work with. In the master version, you can position audio 'objects' around and above the listener so that on devices enabled with Dolby Atmos the experience is completely immersive. Folding this immersive mix down into traditional formats is another area that is very straightforward; downmixing for 7.1, 5.1, and stereo is simple, intuitive, and high-quality. As producers learn the format's capabilities, overall quality goes up and mix times for different output formats goes down.

So, in summary, both Dolby Vision and Dolby Atmos give content creators many ways to meet distribution channel needs, either by delivering multiple versions with much greater efficiency, or, if the distribution channel is also set up for Dolby Vision and Dolby Atmos, delivering the master alone.

Content these days can have a long and varied life across a great many platforms, and in many territories all around the globe. With ever extending shelf lives, there are added incentives to work in the highest quality format possible, namely for futureproofing and archival purposes.

Even if HDR and immersive audio aren't on the deliverables list right now, the process of working within the Dolby ecosystems is designed to be simple. Dolby Vision and Dolby Atmos are efficient enough to consider from the get-go, even on SDR, or 5.1 and stereo projects, avoiding a costly re-deployment of talent for the inevitable remastering and re-versioning in future.

The freedom of working with so much more space - literally, in Dolby Atmos, and metaphorically with the increased dynamic range and palette of Dolby Vision - means there are fewer compromises for everyone - producers, providers, and consumers.

### **How have Dolby Vision and Dolby Atmos benefited European content?**

There's a bit of a preconception that Dolby Vision and Dolby Atmos are all about action movies and bombastic special effects. In fact, Dolby offers benefits to many different types of productions.

For example, 'The Eddy', a Netflix series set in the jazz scene of contemporary Paris, was meticulously shot to create just the right mood, using a style reminiscent of the French New Wave and blending footage shot on 16mm film and 4K digital video. The video was mastered in Dolby Vision HDR, with both HDR and SDR versions being delivered to Netflix.

A very different show, BAFTA nominated 'F1 Drive to Survive', used Dolby Atmos to move all the madness of F1 racing - all the engine noises, screaming gears and other cars - around the edge of the sound stage, and had the driver's radio communications isolated in the middle, creating remarkable immersion, putting the viewer in the centre of it all.

Remasters in Dolby Vision can bring new life to classic cinema as well. 'La Piscine', the 1969 film from director Jacques Deray is set around a swimming pool at the height of summer in the South of France. The film really worked with the interplay of sun, skin, and water. The exceptional colour gamut of Dolby Vision meant that the water of the swimming pool could be made just so, to perfectly capture that sense of place, a world where the emotions of the two main characters could truly come to life.

Consumers have many ways to access content in Dolby Vision, Dolby Atmos, or both. Netflix, Apple TV, Disney+, Amazon Prime, Sky UK and Sky Deutschland all feature streaming content in Dolby formats. Dolby Vision and Dolby Atmos are also included on many UHD 4K Blu-ray discs, and content in Dolby Atmos is also available on a growing selection of standard Blu-ray discs.