

A new generation of visual production professionals is emerging, using cutting-edge technologies to fuel creative leaps in everything from independent films to TV commercials. These small production companies are long on creativity and talent, but short on budgets to match the major studios' equipment investments for visual effects creation and post-production.

Historically, the challenges facing independent studios boiled down to a simple numbers game: Make the investment in a \$100,000 system that can do video production in real-time, or use less-expensive systems and suffer the extreme limitations in time, productivity and ability to compete with the big guys.

DV3 Productions, a small independent production company with a fresh perspective, has found a solution to this "either/or" dilemma. Working with Adobe Creative Suite 5 and systems built around NVIDIA Quadro professional graphics solutions, this upstart studio is using desktop and mobile workstations to produce high production value content ranging from television commercials, to web deliver film shorts to theatre ready movies.



DV3 is led by brothers Obin and Amariah Olson, who between them handle everything from writing and directing to visual effects creation, editing and post-production. Capitalizing on the newest technology available, DV3 Productions is using the CUDA-enabled Premiere Pro CS5 to remove cost as a barrier to unlocking its full potential as a top-flight production studio. This marriage of creative skill and technology is revolutionizing video production.

Taking advantage of this revolution, the Olson brothers created a fully produced, theater-ready trailer for "Nevermore", a feature film project they are shopping around Hollywood. "With a workstation, CS5 and a Quadro, we created an amazing vehicle for marketing our concept for a feature film. With the trailer in the can, we landed a top-notch agent and are now able to open any door we want," Obin said.

Time is money, and money is money

"In our business, time is everything," said Obin Olson, who founded DV3 Productions and counts director and editor among his primary roles. "Video production costs are all based on time. If we can use technology that removes time from the workflow, it super-charges our ability to work and make more money."

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Adobe Premiere Pro CS5 is designed to leverage the CUDA parallel processing architecture of NVIDIA GPUs. The result is an amazingly fluid, real-time video editing experience, that does not require expensive, custom hardware or additional third-party products.

"It's very simple and beautiful, and I can get rid of layers of equipment I no longer need," said Obin. "You get a workstation with a Quadro GPU, put Adobe CS5 software on it, and you can be working like the major movie studios."

"Projects that took hours just for rendering on the timeline can now be done instantly," said Obin. "We now save an incredible 25 to 35 percent of our time."

"When working directly with clients and a change is requested, no one wants to wait. In the past, every time we had to render, it could take up to an hour, and usually we end up needing to render multiple times a day" Obin said. "Now changes can occur in real-time. The time savings are dramatic."

Unleashing the full creative potential

Quadro unleashes the true potential of Adobe Creative Suite users, enabling unprecedented capabilities in real time. Users can refine effects-rich sequences; do smooth scrubbing and playback of complex sequences; build, edit and experiment with any kind of visual effects and apply multiple color corrections.

Using Premiere Pro CS5 in their production process, the Olson brothers can easily take advantage of effects such as Gaussian blur and blend modes; using enhanced keying; working with multiple HD video streams, including RED footage; and even tweaking RGB curves, which up until now was unheard of. Moving to real-time operation completely transforms the workflow process, empowering visual artists

like Obin and Amariah Olson to be more creative.

"When you have real-time capabilities, all creative constraints are lifted, giving me the freedom to explore effects that I wouldn't have considered before," Obin said. "We can stack eight filters on a clip and tweak all the parameters for each filter, to come up with new ideas and new concepts. Then we drag them all onto the timeline and watch them play back in real time on the program monitor."

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In the end, removing limitations to creative experimentation is what the new NVIDIA and Adobe technologies are all about.

"It's an amazing time to be in video production, thanks in no small part to the brilliant partnership between Adobe and NVIDIA," said Obin. "Their products will allow the film industry to get back to what is important in the production: the talent you hire, not the buttons you push and the machines you own. I predict that all kinds of talented artists will be able to come out of the woodwork because of these new technologies., there are no longer limitations to creative people telling great stories and creating high-value projects."



