

## Panasas® ActiveStor® 14 Accelerates Media Production

Calvary Chapel broadcasts sermons to a congregation of roughly 25,000 at its main sanctuary in Ft Lauderdale, Florida and several other venues each week. Another 10,000 people watch online. When it came time to update its video production infrastructure, Calvary selected Panasas ActiveStor 14, PanFS® storage operating system and Panasas content distribution software to streamline its workflow, protect vital digital assets and accelerate distribution.

### SUMMARY

#### CUSTOMER

Calvary Chapel

#### INDUSTRY

Media

#### CHALLENGE

- Upgrade to reliable, scalable shared storage
- Support new file-based HD digital workflow
- Protect mission critical content
- Leverage prior dark fiber investment
- Select reliable vendors with products that scale

#### SOLUTION

- Panasas ActiveStor 14 and PanFS
- Panasas content distribution technology
- MediaDB software

#### RESULT

- Tapeless digital workflow designed around ActiveStor 14
- Video upgraded to digital HD 1080i
- Mission critical video content protected
- Content distribution technology to leverage dark fiber investment
- Improved digital media asset management

### CHALLENGES AND OPPORTUNITIES

“We went to the last National Association of Broadcasters (NAB) show to research a technology refresh,” said Jack Chew, Video Operations Manager at the Calvary Chapel in Ft. Lauderdale, Florida. “We had too many close calls due to failing equipment. It was clear we were living on borrowed time. We also knew it was time to move from SD to HD 1080i, move off videotape to an all-digital workflow, and introduce disk-based video archiving, but we needed to be sure we could find solution components that provided the performance, scalability and reliability to sustain the heavy workloads we anticipated.”

“I also needed to be absolutely certain that the companies we selected would support us, before, during and after the sale. The quality and integrity of the companies we worked with was at least as important as product features,” Chew concluded.

Calvary Chapel clearly needed to move to a state-of-the-art production infrastructure in order to streamline its workflows and delivery systems. Most of Calvary’s video production equipment, however, was well over eight years old when producers there decided to upgrade their capabilities.

“I take my responsibility very seriously for getting the best value possible for my money. We need to honor the money we are given. The advice and support we’ve gotten from Panasas and ReelData has been great. My experience deploying ActiveStor 14 tells me that this is the kind of company you keep.”

Jack Chew

*Video Operations Manager / Calvary Chapel*

### HELP IS AT HAND

“When Calvary Chapel’s, Jack Chew, came to visit us at NAB,” explained Jeff Spalla, co-founder at ReelData, a technology provider to the Media and Entertainment industry, “we showed him some of the critical components, like ActiveStor 14 and Panasas content distribution technology, he would need to create a multi-channel, all-digital, shared storage workflow.”

Panasas and ReelData designed a workflow capable of ingesting and logging raw digital footage and adding Calvary roll-in material to create a master for immediate broadcast to its geographically dispersed venues. Calvary producers also gained the ability to index their digital assets for future post production and rendering work.

## A NEW DAY—TAPELESS DIGITAL WORKFLOW

The Calvary Chapel video production team now runs five Ikegami HDK-55 cameras with Fujinon XA 77x9.5 BESM lenses to a Harmony (formerly Omneon) video server supported by ActiveStor 14 containing three director blades and eight storage blades to provide performance, redundancy and 70TB of capacity. Each camera captures 10 bit 1920x1080 at 50Mb/sec which is ingested to both the video server and ActiveStor 14 using XDCAM HD 422 file formats.

“The video server runs our EditWare FASTRACK application and MediaDB software on which we log raw video for post and archiving. Simultaneously, we pick up two of the raw files, lock them to a time code and send them down optical fiber links to remote campuses miles away. We do all of this live, seven times a week,” Chew said.

“We generate data files in the 90 to 100GB range, on each of five cameras for each sermon, or roughly 500GB of raw video per week. Our master file is about 100GB. That is why initial capacity and the ability to scale out easily were important factors for us,” Chew concluded.

By accelerating performance with Solid State Drive (SSD) technology, ActiveStor 14 easily meets the needs of file-based workloads commonly found in broadcast video production. The blade architecture and the Panasas® PanFS® operating system, assures that ActiveStor 14 delivers the scale-out NAS performance, reliability, and value that perfectly suits media production environments.

“ActiveStor 14 gave us the bandwidth, scalability and reliability to process and protect our mission critical video content as we modernized our workflow,” Chew said. “I particularly like the linear performance scaling as capacity is added, and the way ActiveStor director blades, the ‘brains-in-the-box,’ automatically cluster together for increased metadata performance and reliability. ActiveStor gives me a sense of security that other storage products didn’t,” Chew went on.

## Panasas and ReelData make it happen

Jeff Spalla, co-founder at ReelData, explained, “Jack and the video production team at Calvary Chapel have vision and skill. We were excited to begin when they invited us to help them define the components and processes for a workflow that would really let their work shine.”

“We recommended the best solution elements available, including Panasas ActiveStor 14 with the integrated PanFS file system, together with content distribution technology. ActiveStor 14 is an impressive product, perfect for the broadcast video market.”

### GOODBYE, FLORIDA TURNPIKE

By deploying Panasas content distribution technology, Calvary Chapel has eliminated ‘sneaker-net’ as its preferred delivery method.

Chew explained, “What used to take five people spending hours in their cars driving tapes to remote locations, now takes ten minutes. Our remote locations are watching video streaming from our central production facility in minutes.”

Calvary had previously run fiber to its post processing facility across its campus and to its other venues. One of Calvary’s goals with its technology refresh was to leverage that investment in fiber. The new server and ActiveStor 14 with content distribution software, allows the organization to do just that.

### PANASAS IS ALREADY IN THE BUDGET

“Panasas talked to us the way I thought a vendor should talk to a customer. They listened to what I was trying to accomplish and then helped me get there. The product did exactly what they said it would, and they stood behind it. Panasas went above and beyond. ActiveStor 14 was so fast, it exposed bottlenecks in other parts of our workflow, and Panasas helped us overcome them,” Chew said.

ActiveStor systems support mission critical data in energy, finance, manufacturing, scientific and government settings. Video production at Calvary Chapel is mission critical

to what it does, too, and it gave its producers confidence, knowing ActiveStor delivers in other very demanding environments.

“I feel great about the advice and support we’ve gotten from Panasas and ReelData. Next year, when I need to add capacity, I will simply add another ActiveStor 14 shelf and be good to go. It’s already in our capital budget,” Chew concluded.

