

## **HED: CUTTING COSTS THROUGH CONSOLIDATION AND AUTOMATION**

Deck: Cowles California Media Group Adopts Centralized Master Control and a File-based Workflow at Six of its Stations.

By: Claudia Kienzle

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### **SALINAS, CALIF.**

Seeking to lower capital and operating costs and improve the on-air product, Cowles California Media Group consolidated the control of six of its TV stations at one of the sites; implemented the latest in traffic and automation; and shifted from tape to a file-based workflow throughout its broadcast operations, including news.

To tackle this massive undertaking, Cowles enlisted Advanced Broadcast Solutions (ABS), a systems integrator in Seattle, Wash., which designed and built the new centralized master control infrastructure alongside the existing operations, then seamlessly switched them over without jeopardizing the on-air signals. The entire project was completed within 15 weeks, following an aggressive timeline from mid-October 2008 through January 2009.

### **CONSOLIDATED CONTROL**

Today, traffic and master control for KION-DT (CBS Channel 46), KCBA-DT (FOX 35) and KMUV-LP (Telemundo Channel 23), serving the Salinas/Monterrey market, are handled at Cowles' "hub" facility, in Salinas, Calif. KION-DT also offers The CW as a "dot two" (Channel 46.2) service.

The Salinas facility also handles traffic and master control for KCOY-DT (CBS 12), and KKFY (FOX 11), which is carried on KCOY's dot two channel—both of which are broadcast from Cowles' "satellite" facility hundreds of miles away in Santa Maria, Calif.

In mid-2008, Cowles acquired KION, KCBA, and KMUV, in Salinas, and KCOY/KKVX, in Santa Maria, from Clear Channel Communications, in Bakersfield, Calif. At the time of the acquisition, Clear Channel's KBAK-DT in Bakersfield remotely controlled the Santa Maria operation. But since KBAK was not part of the deal, Cowles needed to determine how best to handle master control of Santa Maria.

"Based upon a feasibility study by ABS, we determined that the cost of building and staffing stand-alone master control rooms at each station could not be justified," said Paul Dughi, president of Cowles California Media Group. "However, by centralizing and automating control of all six stations in Salinas, we greatly reduced our capital and operating costs, advanced our on-air look with widescreen SDTV and HDTV, and eliminated the inefficiencies and technical errors that hurt the bottom line."

### **POWERFUL PIPE**

Rather than taking a push-only approach, with content moving one-way from Salinas to Santa Maria, ABS built in “disaster recovery” such that Santa Maria could survive independently if the lifeline between the two sites was ever severed. Santa Maria can also assume control over Salinas if a disaster ever knocked that master control room off the air.

According to Dughi, “On the first day that this new centralized master control went into operation, we had a power failure at the Salinas facility that lasted 30 minutes. “Since Santa Maria’s content resided on its local servers, which continued to be fired by automation, the programming continued and viewers were unaware that there was a failure of any kind.” Whenever the connection is broken, Santa Maria can continue to operate on its own for up to eight hours.

The connection between Salinas and Santa Maria is a dedicated, 45-megabit DS3 circuit. All programming, commercials, and other content are prepped and ingested in Salinas for all of the stations, and then put onto an Omneon ProCast server. The Omneon server then automatically transfers the files—for shows that two or more stations share in common—via the IP-based DS3 circuit directly to the other Omneon ProCast server in Santa Maria for playout.

### **PROJECTED SAVINGS**

There were many areas where significant savings could be found by virtue of this major renovation. For example, Cowles had been paying \$9,000 per month for its dedicated DS3 circuit, but that rate’s been reduced to \$5,000 per month by negotiating a better price.

“At the start of the project, we did an ROI [return on investment] analysis of their operating overhead, and determined that the ROI would likely be tremendous,” said Mark Siegel, president of ABS. “Much of the savings would stem from implementing automation tools and training the staff to use them properly. Further savings would result from discontinuing use of their bank of 28 videotape machines and one small Seachange server for commercials, and adopting a fully server-based, file-based workflow.”

Since the Salinas facility already had a satellite farm, syndicated programming is received there on a Pathfire server, which automatically flips the shows over to the Omneon server, which in turn sends the appropriate files to Santa Maria. Since there is a CBS and FOX station in both markets, labor efficiencies have been found by doing the prep work once in an automated fashion; and then the Avid Sundance Titan automation system takes care of playout to air.

According to Mark Warner, vice president of business operations for ABS, “Operators in Salinas handle the traffic, master control, automation, signal monitoring, and content management on behalf of Santa Maria.”

“But when it comes to live sports, we do need to have an operator sitting in Santa Maria because the only way to know when a game is going to a commercial is to watch it and then manually trigger commercial playout in realtime,” Warner said. “This is because Salinas and Santa Maria are two different sports markets, and the stations often carry different games even though they’re affiliates of the same network.”

### **AUTOMATED FROM TRAFFIC**

Prior to this facility overhaul, the traffic and master control departments operated as independent fiefdoms. Traffic would send out the log as a text file but it wasn’t in a format that the automation system could read.

“Every day, master control needed to take that text file and convert it for use by their automation system. As a result, it would often be missing triggers and macro events. The operators would then have spend more time massaging the log to find problems and correct them,” said Adam Perez, chief engineer for the Salinas stations. “Now the responsibility for creating operations logs for the entire group has moved upstream to traffic. The logs—created using VCI Traffic—are now being issued in a format Titan automation can read and execute automatically.”

“What’s been critical about this overhaul is that it offers us the operational efficiencies we have been seeking,” said Perez. “Considering the economy’s adverse impact on this business, if we can find workflow efficiencies and execute our broadcast duties more accurately, then that’s the model we need to pursue to meet our financial goals.”

Perez said that another area where cost-savings were found was in multiviewer monitoring. The benefits stemmed from not having to tie up inputs and outputs on the router in order to feed the monitor wall displays. The Evertz VIPX multi-image display system resides on daughter boards inside the Evertz 3-Gigabit Xenon multi-format router. Both facilities have multiviewer display for signal monitoring.

These routing systems are under the control of a Grass Valley Jupiter CM-4000 router and facility control system, which was chosen because it could control next-generation equipment as well as legacy SD and analog gear. The routing infrastructure also includes Evertz VistaLINK Pro processing cards for signal monitoring.

### **BITCENTRAL FOR NEWS**

Concurrent with the master control renovation was an upgrade of the news operations for both facilities. This involved transitioning from video acquisition to 12 new Panasonic P2 HD cameras, divvied up between the two facilities.

The newsroom package also included a file-based Bitcentral Precis news production system, with Grass Valley Edius nonlinear online editors—all MOS-connected to the AP ENPS newsroom computer system.

While the news operations were 4:3 analog before, today the stations offer live local news produced in 16:9 SD, with some HD production elements, but all is up-converted to HD for broadcast. In the future, the local newscasts will be fully HDTV.

ABS designed the newsrooms so that they could use the DS3 circuit to go live between Salinas and Santa Maria; share news stories and weather reports with each other; and even produce each other's newscasts if desired.

### **TRANSITION TO THE FUTURE**

Besides the switchover to the new centralized master control and file-based workflow, the group also shut off its analog stations on February 17, 2009. Dughi said, "That went very smoothly. Part of the impetus behind this massive project was to ready our stations for the cut-off and for HDTV."

According to Mark Siegel, these stations were not new to centralized master control. "We put in 'centralcasting' at these stations back in the late-1990's when they were owned by The Ackerley Group, prior to being sold to Clear Channel and Cowles. So what we've put in at these stations is in essence next-generation centralized master control."