

## SHEA HOMES



Shea Homes is the largest privately held homebuilder in North America. The company is headquartered in Walnut, Calif. with regional offices and residential construction operations in California, Arizona, Colorado and Washington.

### OBJECTIVE

Shea Homes needed a way to get broadband access to construction trailers so site personnel could access its corporate applications remotely. At the initial stages of a construction project, there are no streets or utilities, let alone broadband phone or cable lines, to deliver hardwired high-speed connectivity to the trailer. As more and more of Shea Home's corporate apps moved to web-based platforms, pressure mounted for the company to provide remote access to everything from email and Microsoft Office to project management software and sales applications.

### SOLUTION DESCRIPTION

The homebuilder experimented with a number of wireless options prior to the advent of EV-DO. Initially, they got mobility going with CDMA2000 1X cards enabling their Dell and IBM laptops. They also experimented with satellite broadband, but were not satisfied with the signal delay and the provisioning expense of the dish setup. Often, users set off for the nearest Starbucks to get connected.

In 2005, as mobile broadband coverage expanded, Shea Homes started migrating to EV-DO on the Verizon Wireless BroadbandAccess network. The solution combined Top Global MobileBridge™ communication gateways, SonicWALL firewall security and EV-DO broadband using the integration expertise of Zumsys. Each gateway uses a single Kyocera PC card or Sierra Wireless AirCard® to access the 3G network. Several computers in the trailer are then connected via Ethernet to the ports on the firewall device. This allows a secure site-to-site VPN that limits access to critical business apps rather than the full Internet availability of a typical PC VPN.



[www.sheahomes.com](http://www.sheahomes.com)

### COMPANY

- Shea Homes is the largest privately held homebuilder in North America. The company is headquartered in Walnut, Calif. with regional offices and residential construction operations in California, Arizona, Colorado and Washington.

### OBJECTIVE

- Extend broadband access to construction trailers so site personnel could access corporate applications remotely

### SOLUTION

- Verizon Wireless BroadbandAccess (EV-DO)
- Top Global MobileBridge communication gateways
- SonicWALL firewall/VPN
- Kyocera PC cards and Sierra Wireless AirCards
- Zumsys systems integration

### RESULTS

- Enhanced employee performance and increased overall efficiency of construction operations
- Enabled sales staff to operate at full capability from the first model home
- Improved bandwidth rate to 500 Kbps or better and speed of corporate applications to 10-15 times faster



**A LIST**  
*Finalist*



**SheaHomes**  
*Caring since 1881*

**Shea Homes is a 2006 finalist for the 3G A-List Award in the EV-DO Implementation category.**

The 3G A-List Awards recognize the leading builders of successful wireless data solutions based on 3G CDMA (CDMA2000 1X, EV-DO, and UMTS/HSDPA) technology. **To learn more about the A-List, please visit [www.3galist.com](http://www.3galist.com)**

#### **SUPPORTING PARTNERS**

The A-List also recognizes supporting partners for their enabling role in assisting winners with their wireless data deployments.



“We successfully tested six gateway units in our initial pilot,” recalls Ray Hayes, director of emerging technologies/CTO at Shea Homes. “We call it EV-DO in a box. Today, we have 20 of these boxes deployed. We have supervisors as well as a variety of associates dealing with the trades who need access to email, schedules and other information. We also have an intranet portal called SheaNet that allows the construction trades to download documents and post ‘redlined’ versions back to the site.”

As soon as the first model home is built, sales associates become users of the broadband connection too. “We have associates who handle customer

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*Ray Hayes  
Dir. of Emerging Technologies/CTO  
Shea Homes*

information that need to get buyer program data and change options entered,” Hayes continues. “Some of this information requires extensive bandwidth.”

Once a landline broadband connection becomes available at a given construction site, Hayes redeploys the MobileBridge solution to a new construction site and shifts to a hybrid option at the landline site. “We use a SonicWALL VPN concentrator that

interacts with both the DSL/cable access points and an EV-DO card for failover functionality,” Hayes explains. “In the event that the wired connection goes down, connectivity can be manually shifted to the EV-DO feed so we continue the high-speed connectivity.” In the future, Hayes plans to move to a 3G embedded firewall, which will actually have EV-DO built into the appliance itself to provide automatic failover.

## **RESULTS**

The 3G CDMA implementation is an essential tool for Shea Homes. “Since we absolutely need it for doing business, we don’t have to do an ROI analysis to judge its value,” Hayes admits. “We have to extend the ‘buyer’ application to the sales office in order to sell homes, so mobile broadband is a necessary part of the process.”

In terms of overall receptiveness, Hayes witnessed an overwhelmingly positive response. “Basically, we got a thank you from everyone using it, and their performances went through the roof,” he recounts. “We’ve seen an average bandwidth rate of 500 Kbps or better with this solution and the applications are running 10 to 15 times faster than they did before. We have full usability of our apps and all of them are running seamlessly.”