

Walls Industries, Inc.

About the Company

Established over 70 years ago, Texas-based Walls Industries is a leading designer, manufacturer and marketer of branded work-wear, hunting and outdoor apparel. Walls products are sold under a number of highly recognized brand names, including Walls™, Liberty™, Big Smith™, 10X™, Duxbak™, Zero Zone™, and Commander™. The company's product line includes a full range of insulated and non-insulated utility apparel for use in the workplace and recreational activities.



Communication Challenges

Operating in a historic manufacturing and distribution facility, Walls Industries faced significant challenges in acquiring reliable wireless signal at its headquarters. With the nearest cell tower more than seven miles away and the building constructed using mainly concrete, brick and steel, wireless signal strength was virtually non-existent inside their facility.

"In our business, executives live on their cell phones to get their jobs done effectively," said Tom Felton, Chief Information Officer, Walls Industry, Inc. "Any interference with this ability can be extremely costly to our business."

Complicating the limited wireless coverage issue was the company's legacy in-building wireless system that was interfering with the roll-out of AT&T's local 3G network in the region.

Immediate Action or Costly Consequences

Faced with pressure from the FCC to shut down their wireless system or face fines of up to \$20,000 per day, Walls had to take immediate action.

"We had an in-building wireless system in place that we thought was fine – but we were very wrong," continued Felton. "What we didn't know was that our in-building signal was interfering with the roll-out of AT&T's local 3G network in our area. We had some idea that AT&T had started to move into our county with a 3G signal, but never even suspected our in-building signal would interfere."

Cellular Specialties, Inc (CSI) was called upon for its knowledge and expertise of FCC regulations and 3G networks as well as extensive relationships with the nation's leading wireless service providers, including AT&T. In approximately two weeks time, CSI worked with the wireless service providers to obtain the proper approvals and installed a solution that also adhered to FCC guidelines.

The Challenges

- The need for reliable cell phone coverage for all employees
- The historic building is old, constructed with concrete and steel - the killer of RF signal
- Pressure from the FCC to update their present in-building wireless system interfering with the deployment of AT&T 3G network
- The need for a quick turnaround time to avoid \$20,000 per day fines

The Benefits

- Greater productivity, mobility and communication among employees while inside the facility
- A cost effective AT&T approved system leveraging innovative digital technology
- A solution that adheres to FCC wireless communication regulations



Walls Industries, *Continued*

The Solution: Innovative Digital Technology

CSI designed and installed the CSI DSP85 digital repeater to support AT&T wireless coverage to the entire 34,150 square foot facility, including the sales floor, sales showroom, conference rooms, and all offices with the headquarters building. The selected solution utilizes Digital Signal Processing (DSP) technology to achieve the highest level of performance and flexibility for Walls Industries. The solution provides major benefits over traditional repeaters included unlimited spectrum agility, sharp filtering, and state of the art monitoring and control.

"We immediately noticed that CSI understood everything to do with in-building wireless solutions and how they worked – period," noted Felton. "They really had their game down. CSI was 100 times more knowledgeable than anyone we'd ever seen and clearly had the broad support of the major wireless service providers to ensure our new system met both AT&T and FCC requirements."

Lessons Learned

According to a recent report by Pyramid Research, while the adoption of 3G networks is growing fast, the market can expect to see an even faster adoption rate for 4G networks. The report estimates that the Long-Term Evolution (LTE) technology will break the 100 million subscriber mark in just four years.

With the estimated growth of 3G and 4G only expected to rise, Felton recommends companies to assess their current in-building wireless solutions to ensure there is no interference with current or future signals. Concluded Felton, "With the proliferation of 3G and 4G networks any company that's looking to implement in-building wireless solutions needs to be cautious when it comes to regulations and signal interference. Without hesitation, we would highly recommend CSI for anyone looking to solve their in-building wireless challenges."



"CSI's Custom Solutions Group came in and knew exactly what we had to do to get this critical service up and running again. Their extensive experience and forged relationship with the market's premier wireless carrier and knowledge of FCC regulations ensured that we were back in business with minimal delay."

Tom Felton
Chief Information Officer
Walls Industries, Inc.