



PABCO® Gypsum Helps Create Quiet Barracks for Historical Military Base

QuietRock selected for strict STC compliance with U.S. Army Corps of Engineering standards - lends hand toward LEED certification.


Fort Sam Houston in San Antonio, Texas

Fort Sam Houston in San Antonio, Texas is the world's largest military medical training facility. More than 27,000 military and civilian personnel work at this U.S. Army post, and funding for construction projects on post average \$30 million annually. A National Historic Landmark, and one of the Army's oldest installations, Fort Sam Houston boasts the largest collection of historic structures – more than 900 buildings. The post's different sections represent different eras of historical construction and protect Army concepts in planning and design. Careful preservation of these areas allows the post to live with its history, surrounded by traditions of excellence established when the first soldier arrived there in 1845.

Create Quiet Living Quarters

With an eye to keeping the historical integrity of the post intact, the first of four new construction projects using PABCO Gypsum's innovative acoustical products that will make up the majority of the post's new METC (Medical Education Training Campus) dormitories. These units will house up to 2,400 military medical personnel for short-term training and education. Additionally, construction is scheduled for 1,200 apartments over the course of the next year.

Construction of the 682 modular sections that comprise the METC dormitories were completed offsite using PABCO Gypsum's QuietRock sound reducing drywall.



"Every facility that we're building on Fort Sam Houston, Lackland Air Force Base and Randolph is at least LEED certifiable Silver."

– Air Force Brig. Gen. Leonard Patrick, Commander, 502nd Air Base Wing

There were two key design factors that needed to be addressed in order for this project to be successful. The project needed to meet the STC Rating in compliance with U.S. Army Corps of Engineering standards, and create internal floor space allocated per soldier to exact standards. Because there were external building limitations, the traditional method of using resilient channels would have eaten into floor space, and was not considered a viable option. Fort Sam Houston turned to QuietRock® to allow the project to conserve space as if they were using regular drywall.

There were a number of technical challenges to face in order to be in compliance with the Army Corps of Engineers:

- Create an STC-rating of 50 in a location where nearby training can include base artillery, tank, air, and chopper noise.
- Guarantee the exact specified amount of livable square footage per soldier while dealing with exterior building constraints.
- Ease of assembly was needed for the modular housing to be created in one facility and assembled on post.
- Obtain points toward LEED Certification standards.

The Quiet® Solution

PABCO® Gypsum's Quiet® products allow quiet living in noisy, densely-populated areas like military posts. QuietRock-based assemblies provide a low total cost means of achieving noise reduction.

Use of Quiet products directly support sustainable zoning approaches to land use by reducing material use.

Results to Date

QuietRock was implemented by the builder in a production line environment, and assembled similar to regular gypsum board. The STC rating specified was achieved without sacrificing living space.

Additional benefits for Fort Sam Houston using QuietRock, include:

- Reduced labor costs because the implementation used less material than a standard resilient channel implementation.
- Saved time as a result of fewer steps in the implementation process when compared with building resilient channels.
- No need for installation training which also reduced labor and installation costs.
- Points towards LEED Certification. Fort Sam Houston has been designed to meet LEED Silver Certification standards. Based on LEED-NC, QuietRock can potentially assist architects and designers in obtaining MR4, MR5, and MR6 credits toward LEED Certification.

About QuietRock®

QuietRock replaces older techniques such as resilient channels, clips, sound board and mass loaded vinyl and offers lower cost solutions than other methods for equivalent STC ratings. From 1/2" entry level to 1-3/8" professional products, there is a model for any project. QuietRock hangs and finishes just like standard drywall and is fully lab and field-tested to STC 80, depending on model and assembly. PABCO Gypsum has shipped millions of QuietRock-brand panels for use in thousands of residential and commercial construction projects.

About PABCO® Gypsum

PABCO Gypsum, a division of Pacific Coast Building Supply, owns and operates sustainable gypsum wallboard operations in Las Vegas, NV and Newark, CA. Family owned and operated since 1972, PABCO Gypsum has been providing gypsum wallboard products and superior customer service throughout the Northwestern hemisphere of the United States. PABCO Gypsum began manufacturing and shipping gypsum board from its Newark, California facility in 1972. Five years later, PABCO Gypsum expanded with the acquisition of a combined manufacturing and gypsum quarry facilities north of Las Vegas, Nevada. In 1998 and again in 2005, the Las Vegas plant was expanded and modernized. In 2009 the Newark, California plant was also expanded and modernized. Today, the two facilities supply over 1.67 billion annual square feet of gypsum board, making PABCO Gypsum one of the largest producers in the western United States.

In August 2013, PABCO Gypsum acquired the QuietRock product line and manufacturing operations from Serious Energy, Inc; further strengthening company brand and product portfolio. PABCO's complete line of gypsum products is used in virtually all types of construction from single-family residential to commercial high-rise structures.