

CASE STUDY

Energy Efficient, Healthy Homes



PROJECT OVERVIEW

PROJECT

3-Story Rowhomes

BUILDER

Thrive Home Builders

CONTRACTOR

Rocky Mountain AeroBarrier

LOCATION

Wheat Ridge, CO

RESULTS

Pre-leakage: 5 ACH50

Post-Leakage: 1.6 ACH50

Reduction: 70%

Thrive Home Builders Eliminates Stress of Meeting Code with AeroBarrier

Home builders in the greater Denver area deal with exacting air tightness levels. While some builders might avoid cities with strict enforcement of low air tightness levels, Thrive Home Builders has turned this challenge into an opportunity. In fact, continuous innovation has differentiated Thrive locally and established it as a nationally recognized pioneer.

“We felt it was important to build a brand around energy-efficient homes,” said Bill Rectanus, Thrive’s Vice President of Home Building Operations. “Making it an option for homeowners doesn’t work. But they will pay for a better home. We made energy efficiency a brand standard, regardless of price point.”

As a result, every new Thrive home is designed to meet the highest standards, including LEED®, EPA Indoor airPLUS, Zero Energy Ready Homes, and Energy Star®. This has fueled innovation at Thrive – innovation focused on better ways to create healthy, energy-efficient homes within these standards.



In addition to sound and odor mitigation, AeroBarrier ensures air from each garage doesn’t infiltrate any of the homes.

Bill Rectanus – Vice President of Home Building Operations

Thrive Home Builders



Air Sealing Solves Multiple Issues

Thrive's innovation extends to air sealing, using AeroBarrier to reach 3 ACH50 airtightness with the rowhomes at its West Ridge community in Wheat Ridge, Colorado. These three-story, solar-powered homes come with attached garages.

Prior to AeroBarrier, Thrive was having issues with the garage separation walls. They were failing inspection and requiring the installation of fans to pass reinspection – an expensive, unsustainable solution.

“Our townhomes are grouped together in four, five and six units” said Rectanus. “This makes for a lot of shared walls. In addition to sound and odor mitigation, AeroBarrier ensures air from each garage doesn't infiltrate any of the homes.”

AeroBarrier emits precise levels of safe, non-toxic sealant mist into the pressurized space, automatically drawing the sealant to leaks around windows, drywall, electrical outlets, recessed lighting, and other areas. The computer-guided process allows tightness to be dialed in and is faster, simpler and more effective than the imprecise and inconsistent manual envelope sealing.

AeroBarrier Passing Tests, Reducing Stress

After Rocky Mountain AeroBarrier applies AeroBarrier for Thrive, finishes are applied before the home's final certification test. An independent energy rater must certify the home's air tightness before it can be handed off to its owner.

“Certification is the final hurdle for our projects,” said Rectanus. “AeroBarrier consistently passes the blower door test. It's made our Construction Superintendents' lives less stressful. They know they're going to pass and won't have to scramble to fix any unforeseen issues. Eliminating this issue is a major benefit.”

Thrive Focused on Continuous Improvement

Thrive has evolved to make energy-efficiency a competitive point of difference. But the home builder understands this evolution must continue. As a result, Thrive will not rest in its search for ways to improve its homes.

This restlessness and focus on innovation are clearly paying off for Thrive. In addition to being singled out for multiple industry awards, its application of air sealing with garage separation walls is being studied by the Department of Energy.



AeroBarrier's made our Construction Superintendents' lives less stressful. Eliminating worry about certification is a major benefit.

Bill Rectanus

Thrive Home Builders