

Cedar Ridge High School

Round Rock, Texas

CASE STUDY | k-12 education



Client - Round Rock ISD Rep Office - Texas Air Products Architect - KAH Architects / Perkins + Will Engineers - ESA Engineering Contractor - TDIndustries LEED Certification - LEED Certified

Project Highlights:

- » 375,000 square feet of new and renovated space
- » Sustainable design elements incorporated into the design
- » Divided into four distinct academies
- » Incorporates displacement ventilation technology



ABOUT THE PROJECT

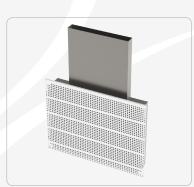
Round Rock ISD envisioned a sleek, modern new campus that would foster growth and development for its students. They wanted a high school capable of unlocking the hidden abilities of their students and one that would aid their teachers in preparing their students for the next chapter of their lives. Cedar Ridge High School is the result.

Cedar Ridge High School is a unique two-story, 375,000 square-foot high school divided into four distinct academies: Academy of International Business and Economics, Academy of Professional Studies, Academy of Science, Technology, Engineering, and Mathemathics, and the Academy of Visual and Performing Arts. Each academy houses its own media center, administration suites and planning areas for teachers. The common areas for all students are the cafeteria, the athletic facility and the outdoor courtyard which is considered the heart of campus and is home to several multi-purpose events.

The design team and Round Rock ISD wanted this school to be an environmentally friendly facility. This LEED Certified school has several sustainable elements featured. It uses local limestone materials on the exterior of the buildings and offers an abundance of natural light. All the windows allow natural light to penetrate deep into the occupied spaces.



TMSA



DVIR



DVBC



TRM



THE TITUS SOLUTION

The HVAC system featured in the high school also contributed toward it achieving LEED Certification. Titus has an abundance of products installed that provide energy savings for the school. Several areas in the new high school utilize displacement ventilation, which is a unique alternative for air distribution.

The DVIR and DVBC are rectangular displacement diffusers. The DVIR is a unidirectional discharge diffuser designed for flush mount applications. The DVBC has a curved face and discharges air via a three-way pattern. Both units provide air distribution by supplying large volumes of air at low velocities into the occupied zone. Easily adjustable air pattern controllers inside the units can create different airflow patterns in the space to optimize occupant comfort. Some additional products featured in the school are the TMS diffuser and the TRM mounting frame.

The Titus TMSA is a steel diffuser that features adjustable vanes which vary the discharge pattern between vertical and horizontal for heating and cooling applications. These diffusers deliver supply air in 360° pattern and are designed to protect ceilings from smudging. All sizes have 3 cones providing a uniform appearance. The TRM is an aluminum mounting frame used to make installation of grilles & diffusers and other ceiling components in plaster and sheet rock ceilings as simple as inserting them in a standard T-bar type ceiling. For typical applications, the frame has adjustable fastening clips which adapt to a variety of plaster and sheet rock ceiling thicknesses.

THE END RESULT

There have been numerous studies on the importance of proper ventilation in our schools. Cedar Ridge High School has a state-of-the-art HVAC system that provides superior performance for its students and faculty. The new high school is also a beautiful campus that has created the best learning environment for the students of Round Rock, Texas. The teachers, staff and administration now have a technologically advanced partner that will assist them in molding the future leaders for the next generation.









605 Shiloh Road Plano TX 75074 ofc: 972.212.4800 fax: 972.212.4884

