

Project: Central Elementary School
Location: Dodge City, KS
Architect: GLMV Architecture
Glazing Contractor: Wickham Glass Co.
Product: FireLite Plus® fire-rated glass ceramic



In June 2015 the community in Dodge City, Kansas, passed the USD 443 school bond issue that included \$85.6 million to aid in updating schools throughout the city. With this money, residents have witnessed multiple school construction projects blossom in the area.

As a part of the USD 443 school bond, money was allocated to Dodge City Central Elementary School to upgrade and meet current fire- and life-safety codes. However, in the midst of the renovations, building professionals faced the challenge of maintaining the beautiful, historic brick-and-glass look of the original 1927 school while raising the building to modern design standards.

To keep the classic look of the school and enhance fire- and life-safety standards, building teams used a mix of fire-rated and non-rated glazing throughout the school. FireLite Plus® fire-rated glass ceramic from Technical Glass Products (TGP) was used to safeguard select areas along the perimeter of the school. The product was installed in stairwells, classrooms, the library and other locations overlooking the interior school courtyard.

Students at Central Elementary are now safer with fire-rated glazing products placed throughout the school. While FireLite Plus fire-rated glass ceramic is fire-rated for up to 180 minutes, in the case of Central Elementary, the code called for the glazing to be fire-rated up to 90 minutes. Consider how, in the case of a fire, this extra amount of time could help both the students and staff exit the building and allow time for first responders to access the scene. Further, FireLite Plus is created with a clear and wireless ceramic material that is impact safety-rated and helps protect against fire and impact on both sides of the glass, acting as an increased safeguard in emergency situations.

An added benefit of FireLite Plus fire-rated glass ceramic is the unique quality of emulating the appearance of ordinary window glazing. This helps the hardworking material visually blend well with non-rated glass systems used throughout the school.

Along with bringing the building up to code, the bond funds were planned to help enhance the learning environment for students. Since studies show that the addition of more windows in learning environments is proven to help students stay alert throughout the day, which in turn helps their overall well-being and learning, designers looked to daylighting to create a more conducive space for learning. FireLite Plus helped meet daylighting goals, by allowing added light flow into spaces such as classrooms and stairwells.

For more information about FireLite Plus fire-rated glass ceramic, along with TGP's other specialty fire-rated glass and framing products, visit fireglass.com.

