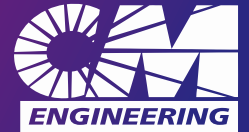




Glenn Elementary School

Normal, Illinois

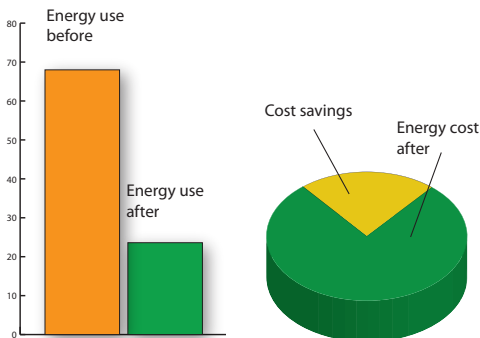
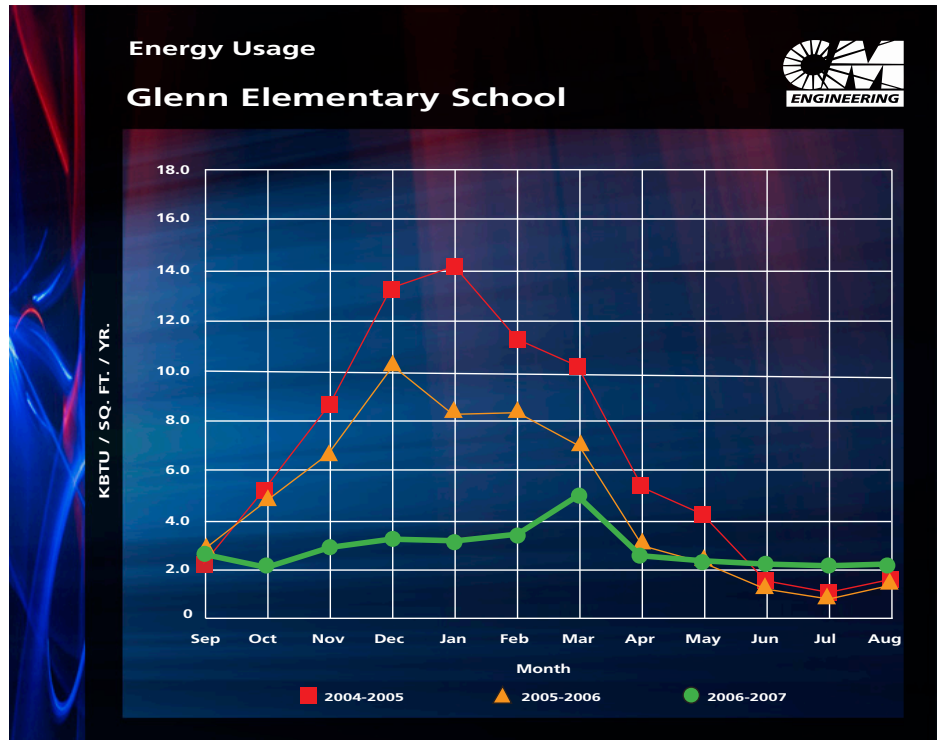


Glenn Elementary suffered from very high operating costs. We replaced the outdated heating system with our One-Pipe geothermal exchange heating system and added air conditioning and individual temperature controls to every space in the building. Comfort levels were dramatically improved throughout the entire school year at a very low first cost.

Our retrofitted system consumes less than 35% of previous energy use. Glenn saves \$5,800 annually on its utility bills and has achieved an *Energy Star* rating of 99.

Retrofit of existing school

- Air conditioning added to classrooms
- Ground source geothermal exchange system
- One-pipe design
- 27,110 square feet
- 14 Classrooms
- Approximately 250 students
- Individual temperature controls in every space
- Retrofit cost \$15.75 / sq. ft.
- Energy use BEFORE retrofit: 68 KBTU / sq. ft.
- Energy use AFTER retrofit: 23.6 KBTU / sq. ft.
- Energy Star rating: 99



Energy use before retrofit: 68 kbtu per square foot
 Energy use after retrofit: 23.6 kbtu per square foot
 Energy cost after retrofit: 78% of previous cost
 Energy cost savings: 22%

Annual savings: \$5,800

The green tracing above shows measured energy consumption after installation of One-Pipe Geothermal exchange heating and cooling system. Red and orange show consumption for two years prior to retrofit. (Data source: Normal, Illinois Department of Education)

"Considering the low first cost and the huge savings in energy cost to our district, we can only wonder why we didn't do this sooner."

Bruce Boswell
 Energy Manager
 McLean County Unit District 5
 Normal, Illinois