



Education - Upgrade

# The Prairie School

Racine, WI

Cree® LED luminaires impress school officials at The Prairie School with the astounding visual impact of the new lighting and the realization of significant cost savings.

- Energy savings of 53 percent
- Better uniformity and more perceived light output than previous high pressure sodium fixtures
- Virtually no maintenance costs





“ We’re not only happy with the impressive light levels of the new LED fixtures but we’re also looking forward to realizing the cost savings on our utility bills from the reduced energy usage. They’re great! ”

**Wm. H. Mark Murphy,**  
*Headmaster and president,  
The Prairie School*

## CREE LED LIGHTING OUTPERFORMS HPS

### OPPORTUNITY

The Prairie School in Racine, Wisconsin is a beautiful, 1965 Frank Lloyd Wright-inspired K-12 school that is well established within the community. Maintaining the contemporary design of the campus while blending within the wooded, rural setting was an important consideration in the installation of new outdoor lighting. The low-profile design of the Cree Edge™ area lights (in bronze Colorfast DeltaGuard® finish) successfully met that criteria.

### SOLUTION

The project involved a one-for-one replacement of an old high pressure sodium lighting installation with the new, energy-efficient LED system from Cree.

The 250-watt high pressure sodium system (consuming 300 system watts per fixture) was replaced with six-light bar area lights (8,040 average delivered lumens — consuming 141 system watts each) mounted in twin- and triple-head configurations onto existing poles. Pole height is 22-feet AFG with 100 x 135-foot spacing.

A 1.01 average mean footcandle level was achieved on the site with an improved max./min. ratio of 8:1. Even though, photopically, footcandle levels are reduced from the high pressure sodium installation, the scotopic impact of the new LED system provides a dramatic increase in perceived light levels and safety for pedestrian and vehicular traffic.

### BENEFITS

Improved lighting quality, reduced maintenance cost and over 50 percent energy savings were achieved with the recent installation of the Cree Edge™ LED area lights in the main parking lot.

School officials were impressed by the astounding visual impact of the new lighting and the realization of 53 percent energy savings with virtually no maintenance costs.

On the energy consumption side, each LED fixture is providing 53 percent or 159 system watts of savings over the original installation. Taking into account the over 50,000 hours of fixture life, the facility will be looking forward to over 16 years of maintenance-free operation.

Wm. H. Mark Murphy, headmaster and president of The Prairie School, commented, “We’re not only happy with the impressive light levels of the new LED fixtures but we’re also looking forward to realizing the cost savings on our utility bills from the reduced energy usage. They’re great!”



Learn more at: [www.cree.com/lighting](http://www.cree.com/lighting) | [info@cree.com](mailto:info@cree.com) | 800.236.6800

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