

# Greenheck Project Profile

## The Lodge At Cedar Creek

### Rothschild, WI

- **Architectural, Engineering and Contracting Firms:**

Bear Valley Engineering  
Madison, WI

Architectural Construction  
and Design, Inc.  
Lake Delton, WI

- **Mechanical Contractor**

Stainless Specialists, Inc.  
Brokaw, WI

- **Greenheck Mechanical Representative:**

Vyron Corporation  
Wisconsin Rapids, WI

- **Greenheck Foodservice Representative:**

Woolsey & Associates  
Waukesha, WI



*The Lodge at Cedar Creek officially opened June 18, 2004. It includes 140 rooms, banquet facilities and an indoor water park.*



## The Ventilation Challenge

- **Provide quiet, energy-efficient bathroom ventilation in 140 suites and a wide range of other ventilation equipment.**
- **Accommodate unusual interior design constraints that produce narrower floor joists.**
- **Create rooftop ventilation units that support architect's exterior design of a Northwoods Lodge.**

After breaking ground in early 2003, the massive Lodge at Cedar Creek in Rothschild, Wisconsin opened for business in June of 2004 as a luxury, all-suite hotel with an authentic Northwoods lodge-type decor and an adjacent 50,000 square-foot indoor water park.

This was a fast track project requiring tight delivery schedules and unique custom adaptations for a wide variety of air movement and control equipment.

To ensure future financial success, Owner Bill Creske insisted that the architects, mechanical engineers and contractors he hired to work on this project maximize guest comfort and energy efficiency. He also wanted a unique and well-designed Northwoods lodge look inside and out to distinguish the facility as a highly desirable destination resort.

# Greenheck's Solution

- **150 standard Greenheck ceiling fans, model SP, and 40 custom-built ceiling fans to fit between narrower floor joists.**
- **Eight rooftop relief vent units, model WHR, with louvered equipment screens painted to match the roof.**

After carefully reviewing the specifications and product recommendations for the ceiling exhaust fans, the contractor ultimately selected an "equal or better" product based on the results of a live sound test that compared Greenheck's model SP ceiling fans with other competitive products. The engineer agreed to substitute

the Greenheck product after personally verifying its superior quiet operation.

To accommodate unique roof lines and angles on the interior of the lodge, the contractor requested that 40 of the total 190 Greenheck ceiling fans be modified at the factory to accommodate installation in spaces between joists that measured four-inches less than normal. Eight rooftop relief vent units, model WHR were installed with a unique louvered equipment screen painted to match the lodge's red exterior roof.

Owner preference for Greenheck as well as energy efficiency and installation

advantages caused the contractor to select Greenheck as the supplier of additional air movement and control equipment including five make-up air units, model DG, ten centrifugal inline fans, model BSQ, one sidewall exhaust fan, model CWB, one centrifugal roof upblast exhaust fan, model CUBE, and eight fire dampers, models FD and CR. In addition, four face supply kitchen hoods, model GHFW, one exhaust only kitchen hoods, model GHEW, and one dishwasher exhaust only style, model GD1, were also provided on the project by the foodservice rep Jon Fisher of Woolsey & Associates, Inc.

## The Results

- The Lodge at Cedar Creek has become a popular choice for weekend and vacation travelers, and continues to enjoy steadily increasing room occupancy rates as people experience the water park, comfortable rooms and extraordinary dining and meeting facilities. The owner is pleased with the quiet operation of the ceiling exhaust fans, and stated that although it was difficult to assess actual energy savings since this is his

first project of this kind, he is pleased with the overall performance of the fans. The mechanical engineer who participated in the sound demonstration said he would specify Greenheck's ceiling exhaust fans (Model SP) from now on. Project Manager Paul Egner of Stainless Specialists said the project went smoothly, and Greenheck was very accommodating in assisting them with some custom product applications including

downsizing the ceiling fans where needed and providing the easy-to-install custom equipment screens. Keith Jolin, Greenheck manufacturer's representative, said, "Perhaps the most unique aspect of this project was simply how well the entire project went despite some interesting architectural challenges. It was completed on time and everyone worked together to create this one-of-a-kind northwoods lodge environment."

