

Case Study Report



Project Identification

Customer: ULTA
Location: Greensburg, Indiana

Design Specifications

Facility Warehouse 670,000' x 40' High
Winter Operation 65° – 0°



Project Challenge:

To design a system that will heat the space as well as deliver 40,000 cfm of outside air into the facility to meet indoor air quality code. Air Energy Systems' Rack System was proposed as an energy and cost efficient alternative to (4) Direct Fired Recirculation Makeup Air Units.

Equipment Solution:

Air Energy Systems solved this challenge by incorporating our Energy Rotation Rack System with Rupp Makeup Air Units operating with an Energy Management System. (6) ER-242-800 and (2) RAM 25 units heat the facility during occupied hours, the MAU bring in required outside air. During unoccupied hours, the Makeup Air Units shut off and the space is heated by The Rack System with no outside air.



Results of Rack System:

Ultra experienced Annual Savings totaling over **\$59,000**:

- Electrical – 300,000 kW at \$.10/kW
- Natural Gas – 36,139 therms at \$.80/therm

Ultra saved **\$.09/sf** in operating costs

Ultra received a Vectren verified Gas Rebate of **\$29,889**.

