

Project Highlight

Minnesota State University, Mankato, MN

AMERESCO 🖓

Minnesota State University, Mankato Reduces Annual CO₂ Emissions by 4,464 Metric Tons

Technology Type:

Energy Efficiency | Energy Savings | Performance Contract

Facility Size

1.7M square feet (31 buildings)

Energy Project Size

\$8,100,000

Annual CO₂ Reduction

4,464 metric tons

Annual Energy Savings

\$404,728





Summary

The Minnesota State University,
Mankato envisioned increasing energy
efficiency, reducing their carbon
footprint campus-wide, and enhancing
their learning environment. Due to
budget shortfalls and an interest
in campus-wide LED lighting and
central plant upgrades, Ameresco
was awarded the \$8.1 million Energy
Savings Performance Contract through
a state-wide competitive bid process.



Solution

Ameresco audited 45 campus buildings; the Energy Savings Performance Contract for Minnesota State University, Mankato encompasses 31 buildings covering 1.7 million square feet.

Energy Conservation Measures include:

- Extensive interior and exterior LED lighting retrofits (over 22,000 fixtures)
- Campus-wide building automation controls optimization
- Chiller Variable Frequency Drive (VFD)
- Installed new chilled water valves
- Central plant boiler system enhancements, including controls and VFDs

The Ameresco staff have been extremely professional and great to work with. Communication was never lacking, and they have been quick to notify me of situations that impacted the work being done.

James Ball Associate Director of Operations, Centennial Student Union





Benefits

This project will help save the University over \$404,000 annually in energy and avoided operational and maintenance costs over the 18-year contract. The guarantee amount is 5,983,084 kWh of electricity savings per year and 2,048 therms per year.

- Annual CO₂ reduction of 4,464 metric tons
- Improved lighting for safer conditions and the creation of more open and brighter spaces
- VFD pump speed reduction producing energy savings
- Removal and replacement of unsupported, outdated boiler controls
- Central plant upgrades including improved feedwater and deaerator controls, precise control
 of chilled water to free-up chiller capacity, and installation of Chiller #2 VFD; chiller modulation
 for improved performance



Ameresco's team of energy experts can assist you in identifying the solution that fits your needs.

For more information about Ameresco and our full-range of energy efficiency and renewable energy solutions, please call **1-866-AMERESCO** or visit **ameresco.com**.