

# **Industrial SPP / Partner Teaming Profile**

#### Service/Product Provider

**Cascade Energy Engineering** 

5257 NE MLK Jr. Blvd, Suite 301 Portland, OR 97211

Business: Industrial Energy Efficiency

Dan Brown, Vice President Phone: 503-287-8488

Email: Dan.brown@cascadeenergy.com

#### **Industrial Partner**

**ConAgra Lamb Weston** 

8701 W Gage Blvd Kennewick, WA 99336

**Business: Food Processing** 

Mike Henderson, Energy Engineering Manager

Phone: 509-308-0335

Email: Mike.henderson@conagrafoods.com

# Cascade reduces energy at processing facilities saving ConAgra \$600,000 annually

#### **Project Scope**

Cascade evaluated refrigeration, compressed air, hydraulics, pumping systems, processes, and controls at twelve ConAgra facilities, and has already implemented projects at five facilities. Additionally, ConAgra and Cascade Energy Engineering launched a pioneering approach to identify low-cost/no-cost energy savings at large industrial facilities. The ConAgra American Falls facility was recently tuned-up, yielding annual savings of 3,800,000 kWh and \$152,000 with a total investment of \$70,000.

# **Project Summary**

Cascade provided facility scoping, energy analysis, project costing, design assistance, commissioning, and final inspection services on projects identified during assessments. Cascade worked within local utility energy programs to obtain study co-funding and implementation incentives for ConAgra.

- Energy Savings
  - \$600,000/yr and 15,100,000 kWh/yr to date (\$1,100,000/yr and 26,900,000 kWh/yr identified)
- Investment
  - \$2,000,000 implemented (\$3,600,000 in total identified upgrades)
- Energy Incentives Recovered
  - \$1,300,000 to date (\$2,100,000 identified)
- Financial Return
  - 1.2 year simple payback on implemented projects
- Other Benefits
  - Improved data acquisition and trend analysis; used remote data collection and equipment control; reduced maintenance and labor

## **Monitoring & Verifying Energy Savings**

Commissioning and final inspection were performed after implementation, ensuring maximum savings from the project by tuning the system or process to operate at peak efficiency. Final inspection confirmed work completion and verified the final energy savings based on post-installation data.

## **Distinguishing Value**

Cascade Energy has a diverse group of engineers and managers that have worked in hundreds of industrial facilities. They were able to provide an experienced engineer with potato processing experience as a point person and liaison for the corporate and plant engineers at ConAgra. This relationship has allowed ConAgra and Cascade to implement bold new strategies such as the facility tune-up effort at the American Falls facility.

