

Kalachandji



Challenge

Aging equipment, no controls

Overview

CVAL Innovations was engaged by Texas Krishnas to evaluate and develop cost-effective energy conservation recommendations for the Kalachandji's buildings. The two buildings consist of a restaurant, temple, gift shop, event hall, offices, living quarters, and various gathering spaces for social and religious practice.

Energy Conservation Measures

- Reduction of energy losses from building envelope
- HVAC Equipment right-sizing and replacement with Variable Refrigerant Flow (VRF) systems on a central controller
- Reduction of operating costs
- LED lighting retrofit

Environmental Impact

The pollutants created by electric power plant generation of electricity consumed by the facility's current operation and that consumed after lighting, HVAC, and other improvements are implemented. The recommended ECMs reduce these pollutants by 29%.

Building Details

- **Location:** Dallas, Texas
- **Building Type:** Worship facility, restaurant and dining.
- **Building Area:** 24,000 sqft
- **Project Completion:** 2017
- **Baseline Building Energy Quotient (bEQ) score:** D

- **Efficiency Measures:** 5
- **Total Energy Consumption:** \$27,907
- **Capital Payback (years):** 10.1
- **Project Completion:** 2017
- **Environmental Impact:** tonnes of CO_{2e}