

# Project Overview

INTERN: Alex Bruening

MAJOR: Mechanical Engineering

## Company Background

IC Energy Solutions specializes in high performance, high efficiency industrial and commercial lighting. Founded in 2013, IC Energy Solutions strives every day to become a leader in the “green” and “efficient” revolution. IC Energy Solutions reaches its goals by providing energy reducing, cost saving lighting products to its customers at a reasonable price, while never losing sight of why this business was started, to help prevent pollution and make a positive change in the world we live in.

## Project Description

Alex Bruening, a 2015 P3 intern, started with IC Energy Solutions in June, 2015. Alex worked with IC Energy Solutions to contact industrial and commercial businesses around Nebraska. After an initial contact was made, Alex audited buildings, focusing on lighting, and then created proposals that recommended proper lighting solutions that would reduce energy consumption, while providing better illumination. Additionally, waste reduction and recycling were also implemented in each project. Alex was involved in every step of the process including auditing, proposal writing, client meetings, and ultimately, sales.

## Pollution Prevention Benefits

The following table summarizes energy savings, cost savings, and pollution reductions from some companies visited.

Client	Annual Energy Savings (kWh)	Annual Cost Savings	Annual CO2 removed (tons)	Payback Period
Lester Electrical – High Bay	85,429	\$7,347	51.9	7.54
Lester Electrical - Office	104,699	\$9,004	63.7	3.16
Theatrical Media Services	56,316	\$5,069	34.2	4.85
US Assets	34,052	\$3,915	20.7	2.64
Neapco	926,591	\$65,046	563.5	2.62
Ideal Images	97,786	\$8,282	59.5	8

Lincoln Journal Star	47,174	\$4,717	28.7	2.63
Comfort Inn & Suites	30,016	\$2,701	18.3	3.85
CSG	5,529	\$636	3.4	2.79
Del Gould Meats	21,751	\$1,514	13.2	4.73
J & J Wire	49,114	\$6,382	29.9	3.77
Leading Edge Printing	19,240	\$2,116	11.7	3.73
Mead Lumber	39,898	\$3,100	24.3	5.37
Phi Gamma Delta	49,164	\$3,935	29.9	0.49
Star City Motor Sports	34,580	\$2,766	21	2.59
<b>TOTALS</b>	<b>1,601,339 kWh</b>	<b>\$126,530</b>	<b>973.9 MT CO<sub>2e</sub></b>	<b>-</b>

Waste reduction and recycling are addressed individually in each separate management report. In addition to the pollution prevention benefits summarized above. All formerly used lighting systems and materials included with it were properly disposed of and all further waste created by maintenance was considerably reduced.

