



Custom Efficiency

For Complex Projects

The story of a long, happy, energy saving relationship

Magic Valley Growers (MVG) is an agricultural marketing company in Wendell, Idaho. “We’re the largest supplier of pearl onions in the U.S.,” Bob Rietveld, the company’s president, said. “And we’re probably among the top two or three in shallot production.” MVG is also a big fan of Idaho Power’s energy-efficiency programs.

“Several years back we enrolled in Idaho Power’s irrigation program,” Bob said. MVG’s first energy efficiency effort involved putting timers on its pumps. Then, MVG upgraded its entire irrigation system to use less pressure, and thus, less electricity. Finally, MVG installed frequency drives on its larger well pumps, which not only saved electricity, but also reduced wear on the equipment.

“Frankly, we thought we’d done everything we could,” said Andy Hornbacher, MVG’s storage manager. “Then Leo introduced us to the Custom Efficiency program.” Leo Sanchez is a commercial customer representative in Idaho Power’s Twin Falls office. “Right off the bat,” Leo said with a smile, “Bob decided he wanted to be a part of the program.”

Starting small, saving big

MVG’s first Custom Efficiency project was a small lighting retrofit in one of its large storage facilities. “Bob liked the rebate and the energy savings so much,” Leo noted, “he decided to upgrade the lights in the other buildings, as well. Then, when we were finished, he said, ‘What else do you have?’”

Bob and Leo started looking at the refrigeration systems in MVG’s storage sheds. MVG’s potatoes must be stored in a very controlled environment: around 38°F and 95 percent humidity. Pearl onions are equally finicky. “We use a terrific amount of fan power,” Andy pointed out, “because we have to move a lot of air through thousands of tons of very small product.”



The math of energy efficiency

Bob pointed out, “It’s about twice as efficient to run two fans at 50 percent frequency output than to turn one of them completely off. But you need a variable frequency drive (VFD) to do it.”

Once the VFDs were installed in the first shed, Bob turned to his ventilation contractor and said, “What else can we do?”

The contractor introduced MVG to electronic expansion valves (EEV) to replace the thermal expansion valves (TXV) that controlled each shed’s refrigeration system. EEVs not only are more energy efficient than TXVs but also protect the system from freezing.

MVG annual energy savings total almost 368,000 kWh, or \$20,240—enough energy to serve 20 homes for one year.

The savings

MVG recently completed installation of a VFD system and two EEV systems in three of its facilities. The table below shows the costs, rebates, and savings (in kilowatt-hours [kWh] and dollars) of the three projects. MVG spent \$37,665 on the upgrades, of which Idaho Power rebated the company \$26,366, resulting in an almost immediate return on investment.

Project	Project Cost	Rebate	Savings (kWh/year)	Savings
Santan East EEV project	\$4,979	\$3,485	30,000	\$1,650
Santan West EEV project	24,716	17,301	249,715	13,734
Tuttle ¾ VFD project	7,970	5,580	88,000	4,480
Total	37,665	26,366	367,715	19,864

Uncommon savings are quite common

Saving energy has always been a smart business decision. Now, Idaho Power makes it attainable. Our complete suite of energy efficiency programs provides attractive incentives to commercial and industrial customers who want to reduce their utility costs.

- The **Custom Efficiency** program offers substantial rebates to large commercial and industrial customers who invest energy-saving improvements in their facilities.
- **Easy Upgrades** provides incentives of up to \$100,000 when companies retrofit their infrastructures with energy-saving upgrades.
- The **Building Efficiency** program pays up to \$100,000 *per project* to mitigate the additional capital costs when companies upgrade their lighting, cooling, controls, and building shells to more efficient components.
- **FlexPeak Management** offers commercial and industrial customers incentives in the form of recurring payments for reducing their power consumption during times of overall peak demand.



A valuable resource for your business

"It was Leo who came to us with these programs to begin with," Bob said. Like every Idaho Power customer representative, Leo Sanchez is a valuable resource for his commercial and industrial customers. His service area stretches from Bliss in the west to Kimberly in the east. In between are dozens of businesses like MVG who benefit from his knowledge and experience. After all, as Bob said, "It was really Leo who pushed it through."

How much can your company save?

For more information about Idaho Power's energy efficiency incentive programs, go to www.idahopower.com/business or call us at 208-388-5624. We'll show how you can join smart companies like MVG, saving energy and money.

The above success story was produced in cooperation with, and approval from, Magic Valley Growers.