Silicon Valley Power earns spot as top utility

On April 1, 2019, Silicon Valley Power (SVP) was recognized with the American Public Power Association’s (APPA) RP3 Gold designation during the Association’s annual Engineering & Operations Conference. The RP3 designation, which lasts for three years, honors public power utilities that go above and beyond for their customers and employees. It acknowledges organizations that excel in four key areas of operation:

1. Reliability
2. Safety
3. Workforce development
4. System improvement

SVP is part of a small group of utilities to earn this distinction out of the more than 2,000 public power entities throughout the nation. It is a celebrated achievement that reflects SVP’s commitment to the reliability and safety of the electric system. The RP3 Gold designation represents SVP’s pledge to provide safe and dependable service to its nearly 55,000 residential and commercial customers while striving for innovation and ensuring the safety of all employees. To learn more about APPA and the RP3 award, visit publicpower.org.

Celebrating 15 years of renewable energy

Silicon Valley Power is celebrating the 15th anniversary of Santa Clara Green Power, an award-winning voluntary program for business and residential customers to match their electricity with renewable energy.

In 2018, business customer enrollment made up over 375,000 MWh of renewable energy, contributing 93 percent of program participation. Businesses across Santa Clara have continuously taken part in Santa Clara Green Power as a way to support renewable energy and meet their sustainability goals.

Santa Clara Green Power provides business participants with marketing material so they can position themselves as environmental leaders in the Santa Clara community.

For more information on Santa Clara Green Power and how to become an environmental leader, visit siliconvalleypower.com/green.
Lighting performance: How do LEDs compare?

When you’re selecting new lighting systems, you want products that perform according to manufacturer’s claims. That’s especially true of newer lighting technologies, such as LEDs. The U.S. Department of Energy’s CALiPER testing program is here to help. They recently compared the performance of five commonly used LED products with conventional lighting technologies. Here we summarize the results.

**Trophers**
The mean efficacy of currently listed products is 102 lumens per watt (lpw), compared to 90 lpw in 2014. All of the listed troffer retrofit kits and most of the troffer luminaires have a color rendering index (CRI) in the 80s. The output of these products is more than sufficient to match that of conventional fluorescent troffers.

**Outdoor area lighting**
At any given output level up to the equivalent of 1,000-watt high pressure sodium lights, LED products are available with substantially higher efficacy — from roughly 93 to 98 lpw. Approximately 63 percent of the outdoor area luminaires listed meet the output and efficacy specifications for the DesignLights Consortium™ Qualiﬁed Products List. Roughly 50 percent of LED outdoor lighting products have a CRI value in the 70s, which is generally acceptable for outdoor applications.

**Linear lamps (TLEDs)**
The mean light output of the four-foot TLED products listed is 2,094 lumens. With an average lumen loss of 17 percent when installed in a louvered troffer, these bare TLED lamps result in overall luminaire efficacy comparable to troffers equipped with linear fluorescent lamps. However, purpose-built LED troffers are more efficient than troffers with TLED tubes. Newly listed bare lamp products have an average efficacy of 101 lpw. The color and power quality characteristics of TLEDs are generally uniform, with CRI in the low 80s.

**Downlights**
Most currently listed LED downlights meet the ENERGY STAR® minimum efficacy requirements of 55 lpw (the average is 69 lpw). The average LED downlight lumen output is 1,185 lumens. However, four dozen downlights currently listed by LED Lighting Facts emit more than 4,000 lumens, a significant increase from 2014. Roughly 40 percent of listed LED downlights have a CRI in the 90s, which is considered high color fidelity.

**Electrical hazards: Keeping your workplace safe**

Electricity is essential to the workplace. Although it’s generally safe and reliable, electricity can be hazardous, even fatal, if treated improperly. The Electric Safety Foundation International (ESFI) sponsors National Electrical Safety Month each May to help raise awareness and educate people about the risks involved.

Exposure to electricity usually results in shocks and burns; shocks can cause cardiac arrest. The severity of the shock depends on the amount and path of the current, as well as the length of contact time. If you suspect an employee has suffered an electrical shock or burn, seek medical assistance immediately. Have someone else call for help; don’t leave the victim alone unless there’s no other option.

**Ensuring safety**
Most workplace electrical hazards are the result of one of three factors: faulty or unprotected equipment, an unsafe working environment or risky work practices. Safety methods include:

- **Insulation.** Insulators — including rubber, plastic or glass — stop or reduce the flow of electrical current. The insulation should be suitable for the voltage used and the environmental conditions. Insulation is often color-coded. Grounded wires are normally green or white; hot wires are typically black or red.

Protective devices. These limit or stop the flow of current automatically in the event of a ground fault, overload or short circuit. Common examples include fuses, circuit breakers and ground-fault circuit interrupters.

- **Grounding.** Exposed live parts operating at 50 volts or more can be isolated or enclosed to prevent accidental contact. Common techniques include an electrical room, elevated platform or permanent screen. The area should be prominently marked with signs warning of the potential hazard.

- **Safe work practices.** Safety devices are essential, but they’re only effective when combined with sound work practices:
  - Overhead power lines can be dangerous. When working near power lines, maintain a safe distance and ground any equipment that may become energized.
  - Turn off the current to electrical equipment before making inspections or repairs.
  - Before connecting electrical equipment, check the insulation for exposed wires or other defects.
  - Only use tools that are well-maintained and in good repair. Remove from service any equipment found to be defective or potentially hazardous.
  - Use appropriate personal protective equipment when working directly with electricity; this could include rubber-insulating gloves, helmets, hoods, blankets and line hose.

The best defense against electrical hazards is using good judgment and common sense. Exercise caution when working with or near energized equipment. De-energize electrical equipment before making inspections or repairs and make sure all equipment is well-maintained, properly insulated and grounded. Follow all warnings and rules regarding electrical hazards and safety.

Craig Lindquist
Crew Foreman

**Background:** Craig first considered joining the utilities sector after hearing some of his fellow volunteer firefighters describe the thrill of working as lineworkers. He got his first utility job in the gas department at Pacific Gas and Electric and soon transitioned to its electric department to pursue his dream of becoming a lineworker. He has since worked at Silicon Valley Power (SVP) for the past 16 years. Today, Craig primarily works as a crew foreman, where he coordinates with contractors and SVP crews to ensure safety and productivity across job sites.

**Comment:** When asked about his tenure at SVP, Craig explained, “It’s funny. I came to Silicon Valley Power when I was just a young kid who looked up to the older, established employees, but now, all of a sudden, I’m one of the old guys!”

**Favorite Pastime:** Craig spends most of his free time at home in the Santa Cruz Mountains. “I live right on a golf course. It’s so beautiful – I love watching people play and am part of a men’s golf club myself.”

**Working at SVP:** Craig appreciates the unique culture at SVP. “Silicon Valley Power has the sort of family environment I look for in a job. Even though we provide vast amounts of electricity to Santa Clara data centers, it still feels like a small company that really values its employees.”