





What type of solar lighting do you need?

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Why Solar Lighting

Lights provide security and illumination to areas that require lighting needs. A lot of the time those areas are located where standard electrical power is not available. Solar lights are a great alternative and a cost effective solution. They range from small one LED fixture that runs along a home's driveway to powerful street lights that can illuminate a 150' area.

Why Solar Lighting

Solar lighting also has many other excellent qualities. It is a green alternative to traditional lighting, it is low cost and practically maintenance free, and there is no power bill associated with utilizing solar since the power is not coming from the grid. Solar is also low voltage which makes it much safer to install and operate. Finally, solar lighting is renewable and promotes sustainability; its only requirement is the sun for operation.

Commercial vs Non-Commercial Solar Lighting

There are many types of solar lights that utilize many types of technologies. The local home improvement store will sell small scale solar lights that are much different then the ones being manufactured for commercial applications. Depending on what the customer wants to spend on a system, the variations can be great.













Commercial Solar Lighting

Solar lights that are in production for commercial applications such as roadways, billboards, parking lots, etc. have a higher up front cost, but they will pay for themselves almost immediately. These systems provide lighting for specific applications with different run time settings. They also provide many days of stored power to provide continuous reliability, even during times of inclement weather.





Commercial Solar Lighting

The light power is different as well. Each system is built for the type and wattage lamp that will be utilized for that specific application. Lighting a billboard will take much more power then lighting a small pathway which is also different from roadway and parking lot applications. That makes the commercially manufactured solar lights more versatile to adapt from one job to the next.











Non-Commercial Solar Lighting

The solar lights you can purchase at your local home improvement store are much different. There is still battery storage, but it is small and only has enough power from the amount of sun it received that day, and generally only for a few hours during the night. If there is a cloudy day, the lights will not last as long. The lamps used in these usually only consist of a couple small, low powered LED lamps.



If you are lighting up a driveway or walkway just for markers or environment lighting, these work perfect. If the project requires more lighting for security or large applications, commercially manufactured solar lights are the way to go.







CFL vs LED

There are many benefits to CFL lamps. They are less expensive, have a long life span, and are available worldwide. They give off a great amount of light and cost pennies to run compared to incandescent lamps. They are also versatile and fit in almost any standard light socket. All this combined makes them a great choice for in solar lighting applications or just an energy efficient change out in the home or office.









CFL vs LED

LED lamps are still in their infancy. The technology has been available for quite some time; however, the ever changing technology means the standards are changing rapidly. These lamps are higher cost, but have an even greater life span then CFL lamps. They also use less energy then any lamp on the market. They are also mercury free, a great alternative to fluorescent lamps.









Solar Lighting Controls

So you want to install solar lights, but you don't need them to run all night. There are many options to control your solar lights to not only peak efficiency, but also allow for specific lighting during times of need. SEPCO offers a wide range of solar lighting control electronics to do just that.



Dusk to dawn is the most popular. The light does exactly what someone would think; it comes on at dusk and turns off at dawn. This draws the most amount of power as the light must run all night, up to 15 hours in some areas.







Solar Lighting Controls

If the solar light only needs to run for a certain number of hours per night, there are options such as dusk for a number of hours, actual time frames with the real time clock, or for dusk for a few hours and back on just before dawn. There are also options for turning on the light only when the area is occupied through a passive infrared sensor or spring loaded switch.

Finally, a technology now being utilized is dimming of solar lights. An LED light can run at full power for part of the night, and then dim down when traffic is down. The solar lights can also have an option to go back to full power if a sensor is activated.







Three Steps to See if Solar Lighting is Right for You

Solar lighting provides a great alternative to traditional electrical lights. They can be installed anywhere as long as the solar panel has direct access to sunlight. Here are three easy steps to see if solar lighting is your best alternative for lighting just about anything.

1. Is there electric already available?

There may or may not be electric already available in the area needing to be lit up. If there is electrical, great, then you have two options; however, if there is no electric available, then the

cost of trenching and adding the needed electric should be considered. Solar lights, because of their nature, can be installed anywhere. The solar panel must have direct access to sunlight, but the lights can be placed just about anywhere, even in shaded areas. The cost of trenching and bringing electric out to some sites can be very costly and solar is a great alternative than adding those unnecessary expenses.











Three Steps to See if Solar Lighting is Right for You

2. What are the required lighting levels?

In today's industry, lighting can be a faint glow just for mood, or bright enough to read under, and all types of lighting can range from one end of the spectrum to the other. Personally, I have solar LED strand lights on my back porch for mood lighting



which are powered by solar that provide just a soft warm glow for atmosphere. Other applications can be for street or parking lot lighting. Solar lights can be a great alternative in replacing already installed lights for a lower overall electric bill or installed in a new application where a green alternative is high on the list.







Three Steps to See if Solar Lighting is Right for You

3. Are you looking for a green alternative?

Solar lights provide a green alternative to traditional lighting applications. Solar lights are separate from the grid, produce no greenhouse gases, and provide lighting even if the electric fails for any reason. They are completely self-sufficient and require little to no maintenance.



Conclusion

While the high upfront cost of solar lighting can be daunting at first glance, the reality is that in the long run, solar lighting is far more economical than standard AC power lighting when all things are taken into consideration (i.e. parts, installation, electricity and maintenance). Better yet, solar lighting is good for the environment and will eliminate thousands of pounds of CO₂ over their lifetime. So next time you are in the market looking for lighting options, look at solar lighting. From commercial applications such as parking lots, roadways, and signs; to smaller applications like gardens, driveways, and atmospheric lighting, solar provides a great alternative.







Have An idea for a solar lighting project?

Contact Us Today!

One of our solar specialists would be happy to help you choose the best option for your lighting needs and provide clean, renewable solar energy!

See our Guide to: How Solar Lighting Can Save You Money

OR

Check Out An Amazing Case Study





