



BRIGHT LIGHT
SOLAR VCC

BRIGHT LIGHT SOLAR VCC LTD FREQUENTLY ASKED QUESTIONS – RESIDENTIAL ESTATES

What is a grid-tie solar solution?

A grid-tie solution requires the national electricity grid or a generator to provide power before it will work. In the event of load shedding and no generator or battery storage system to provide a reference point, your grid-tie solution will not deliver any energy.

What is kWp?

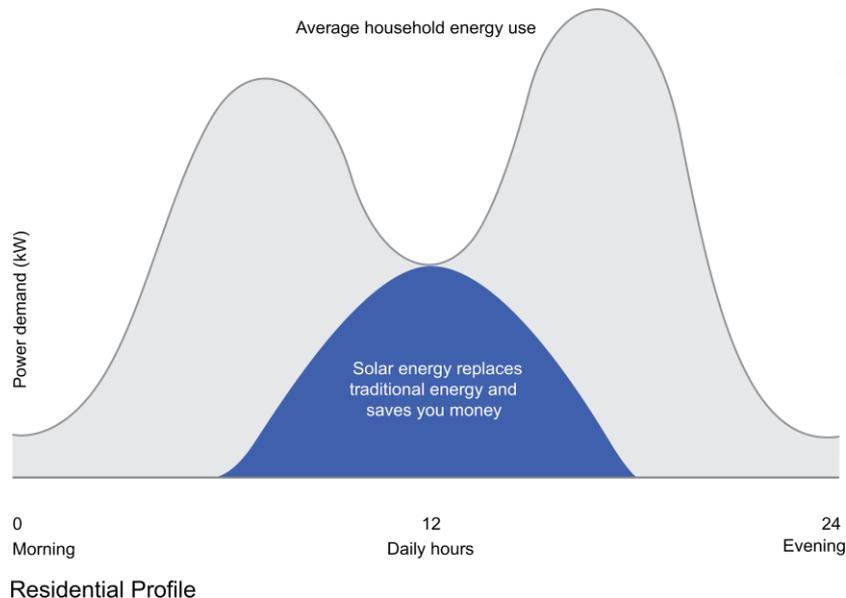
Watt peak or kilowatt peak refers to the rated maximum power output of a Solar PV facility

How do solar panels work?

Sunlight streams millions of tiny bits of energy called photons. When the sun's rays hit your solar panels, the semiconducting material inside the panels absorb the photons. Energy from the photons forces electrons out of the panels as direct current (DC) electricity, and conductive wire carries that DC electricity to an inverter. Before the power can be used, the inverter needs to transform the DC electricity to alternating current (AC) electricity. AC electricity, generated from renewable solar energy, runs from the electrical panel to all the outlets throughout the building.

How much energy and when does solar generally cater for?

Solar energy comes from the sun. We size the solar system to cater for the average daytime energy consumption pattern of the residential estate. This generally follows the pattern shown in the below illustration.



What happens when it rains or is overcast?

Solar panels generate less power during periods of cloud cover. Your residential estate would obtain more power from your utility provider or from battery storage (if you choose to install) during this time.



BRIGHT LIGHT
SOLAR VCC

What equipment can I power from the system?

Any equipment that uses electricity to operate can be powered from the solar infrastructure.

What is the lifespan of the solar infrastructure?

Solar infrastructure generally has a design life of 25 years, but panels can last for as long as 35 to 40 years. However, solar panels do gradually lose efficiency over time (performance guarantees from suppliers ensure that they do not drop below 90% efficiency after 10 years and 80% efficiency after 25 years).

What happens when new technology arrives?

Solar technology is improving every year, while costs seem to have flattened out. This will likely result in less space being utilised in coming years, as the solar panels become more efficient. As technology improves and new technologies become feasible, we endeavour to offer your residential estate the opportunity to install storage solutions and potential upgrades to existing infrastructure, although you will not be under any obligation to do so.

What does the solar installation cost?

There is absolutely no upfront capital cost for the residential estate. We fund and own the infrastructure until the end of period and charge the residential estate based purely on consumption of solar energy. The residential estate can however purchase the solar infrastructure from us after a period of 5 years.

What are the benefits of the Bright Light fully funded model versus owning the solar infrastructure outright?

One of the most commonly asked questions by business owners is why one should fund, rather than pay cash for the infrastructure outright. There are several reasons why we motivate a funded model versus ownership, including the elimination of technology and regulatory risk associated with ownership.

In addition, whilst it may seem as though one is benefiting from “free electricity”, there are several costs associated with owning the infrastructure, including insurance, ongoing maintenance and monitoring costs and if any of the infrastructure had to break out of warranty, the replacement cost could potentially be significant.

Constant monitoring and maintenance of the installation is required to ensure optimal performance and savings generated from the infrastructure; which means you only pay for what you use. Along with this, the solar tariff is lower than the council tariff and there is no regulatory risk as there is no effect on regulatory changes

How much can my residential estate save from installing solar?

Residential tariffs differ vastly across the country and savings will depend on several factors, including installation complexity, Rand exchange rate and current tariff structure. We have however on average achieved between a 5% and 25% saving compared to current client tariffs.

What happens if the residential estate cancels the contract?

You can cancel the contract and pay an early termination cost, which includes the cost of relocation of the solar infrastructure, or you can purchase the solar infrastructure from us.

Would a solar solution add value to my property?

Definitely. A solar solution will provide electricity and shield a tenant / future unit owner from future tariff increases. The residential estate has the benefit of retaining the financial benefit of the savings or sharing the benefit with the unit owner, who in turn can pass this on to the tenant to attract a better-quality tenant and / or maximize occupancy rates.

What happens if hail and / or other inclement weather damages the solar infrastructure?

We insure the solar infrastructure over the period of the contract and will replace any damaged and / or non-performing solar panels. There is no cost implication to the residential estate.



BRIGHT LIGHT
SOLAR VCC

How does the residential estate make payment?

A calibrated billin meter is installed and each kWh that is produced and delivered to the residential estate is recorded. This gives all stakeholders the ability to view what generation and consumption is being used in almost real-time fashion. We process an invoice at the end of every month based on the consumption data from the meter, which is then presented to the residential estate for payment.

Where will panels be placed and what size of space is required?

Panels are generally mounted on roofs and carports. With the current South African solar irradiation conditions, 6 to 8 m² is generally required per kWp.

What must be done to ensure that the solar solution will be feasible?

A desktop study of the property will be completed utilising the location and the billing history. We also confirm consumption levels by placing a data logger at the property before we install.

Do you supply solar geysers?

No.

What industry body does your business belong to?

SAPVIA (The South African Photovoltaic Industry Association).

Will the solar installation be able to feed back into the grid?

Whilst there are some municipalities that allow feed-back into the grid, our solution does not currently cater for this scenario. The current legislative regulatory framework in South Africa does not make this possible to a large extent, however legal net-metering, wheeling and feed-back are imminent. When feasible, the solution will be offered to you.

What role does solar power typically play for the residential home owner?

Residential home owners can save money, depending on the current electricity consumption, the savings are also dependent on the electricity rates set by the home owners utility.

As a residential home owner, how do I get off the grid and how affordable is it?

For one to be grid independent, a battery storage solution needs to accompany the solar installation. Although it is technically feasible, the cost compared to current electricity tariffs, make the solution commercially unfeasible for most clients.