

Network tariff changes for large electricity users*

*Customers who are on a demand charge

How are large customers charged?

Large electricity users pay a peak and off-peak kWh usage charge as well as a kVA demand charge.

Why measure demand using kVA?

kVA better reflects the physical capacity and costs of the network required to supply electricity to a site. It also encourages large electricity users to manage their peak kVA demand, improve electrical efficiency and drive down overall electricity costs.

Reducing peak kVA demand is the most effective way of reducing your electricity bill. When it is not possible to reduce peak kVA demand due to the nature of your business, it can be reduced by improving your power factor.

kVA vs kW

kVA = apparent power

Reflects the amount of current through electrical infrastructure and determines the capacity of the power lines, cables, switches and transformers needed to supply electricity to a site.

kW = real power

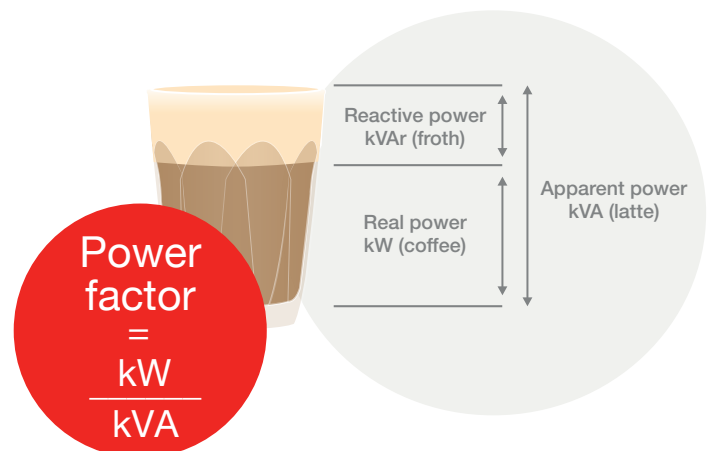
Is the component of apparent power which can be converted into energy. Lighting, heating and machinery motors all convert apparent power to real power at different levels of efficiency. When a site draws power which is not directly used, it is known as reactive power.

What is power factor?

A power factor is the ratio of real power to apparent power.

A good power factor (close to 1) means you have systems which are more efficient, so your equipment will run more efficiently.

A bad power factor means you will have greater apparent power than real power requirements, so we need to supply more electricity for your use.



How do I improve my power factor?

You can improve your power factor by installing power factor correction equipment known as capacitor banks. These work to correct energy supply inefficiencies, while also reducing peak kVA demand on the electricity network.