

Distribution Loss Factors – Frequently Asked Questions

Glossary

IPART	Independent Pricing and Regulatory Tribunal of NSW.
NEMMCO	Australia's National Electricity Market Management Company.
DLF	Distribution Loss Factor, a number multiplied by a premise's metered energy to account for electricity losses between the transmission control point and the consumer's premise.
DLF Code	A four character code that is recoded against each premise in NEMMCO's consumer management system.
TLF	Transmission Loss Factor, a number multiplied by a premise's metered energy to account for electricity losses between the Central Reference Node and the nearest connected transmission control point.
DNSP	The company that distributes electricity to your premise.

How do DLF's affect my electricity bill?

NEMMCO charges electricity retailers for metered energy at your premise multiplied by the relevant DLF and TLF. The sum of the combined distribution and transmission losses are then factored into the final tariff that you pay.

Who Calculated my DLF?

Your local electricity distributor calculates DLF's annually.

How do I know the calculation is reasonably accurate?

The calculation is regulated and reviewed by IPART each year, under the National Electricity Rules.

Where can I find out more about DLF's, the requirements and methodology for setting DLF's?

DLF's are published each year by NEMMCO at:

http://www.nemmco.com.au/transmission_distribution/171-0012.pdf

Country Energy's DLF codes are listed and explained in our Network Price Book, which can be found at:

http://www.countryenergy.com.au/internet/cewebpub.nsf/Content/dld_elec+network+pricing

IPART also commissioned a consultant (Intelligent Energy Services) to determine and explain a standard & compliant methodology for the calculation of DLF's. Their report can be viewed at:

http://www.iprt.net/papers/IES_DLF0904.pdf

(Section 3.6.3) of the National Electricity Rules sets out DLF requirements and can be accessed at:

<http://www.aemc.gov.au/pdfs/rules/chapter03.pdf>

What causes losses?

As the electricity flows through Country Energy's wires and transformers, some of that electricity is converted into heat. More heat is radiated when the demand for electricity is higher. Theft is built into DLF's and industry experts estimate that theft may be of the order of 0.5% of total electricity delivered.

What does Country Energy do to reduce losses?

Country Energy has a number of strategies for reducing losses including:

- Using higher voltages to transfer energy over longer distances;
- Making sure the voltage never drops by more than 5% over any part of the low voltage network;
- Replacing low capacity single phase networks that use voltage boosters to maintain voltage, with three phase networks;
- Specifying low loss transformers for all new work;
- Managing peak demand by offering controlled load tariffs and time of use tariffs; and
- Employment of staff to investigate unusual movements in consumption patterns in order to identify suspected cases of theft.

How has Country Energy calculated my DLF?

Country Energy uses a set of "typical" network models to assess the losses in each stage of its network to calculate relative losses. Those values are scaled to represent the sum of losses attributable to network assets in each category. Losses at the lowest level (ie low voltage network) are adjusted so that the sum of each premise's forecast metered energy times its respective DLF will be equal to the forecast total network purchased energy.

Why doesn't Country Energy have more differentiated DLF's?

The cost of assessing each of our 760 000 premises would be prohibitive. We would also need to monitor each connection point for changes.

LARGE CONSUMER DLF'S

Why have I been given a site specific DLF?

Under the National Electricity Rules, any consumer who uses more than 40GWh's per year or has a maximum demand of 10MW or more must have an individually calculated DLF.

How does Country Energy calculate site specific loss factors?

We use dedicated loadflow software, specific network parameters and half hour load data to simulate that part of the network for every hour in a twelve month period.

Why is my DLF less than 1.000 and what does that mean?

A site specific DLF will generally be less than one if there is an oversupply of generation at that point. If you are an embedded generator, the energy that you sell to the pool will be slightly less than what is recorded by your meter. The more you generate, the more losses you cause in the local network.

Will my site specific DLF be similar to my TLF?

No, there's no relationship between these factors. You may happen to be connected through a short run of distribution network connected to a long run of transmission network.

For more information please contact us at:

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