



Technical Bulletin

TB 0245A – Utilising existing network assets

Purpose

This technical bulletin has been issued to clarify design requirements in MDI 0028 clause 4.6 regarding greater capacity utilisation of existing network assets.

Background

Clause 4.6 in MDI 0028 states in part *“for multi-dwelling developments in urban areas, for loads of 150 Amps per phase or greater (as assessed by Endeavour Energy) a padmount substation may be required on site, unless an existing adjacent padmount substation is capable of supplying the new load”*.

This clause is currently being interpreted by some stakeholders as “a padmount substation is required on site for every development requiring a load of 150 Amps per phase or greater, unless there is an existing padmount directly adjacent on a shared property boundary”.

This interpretation has the potential to lead to underutilisation of network assets.

Additionally, this technical bulletin provides clarity for the LV backup requirements for multi-dwelling developments as they are not explicitly stated within MDI 0028.

Actions

The term “adjacent” in Clause 4.6 in MDI 0028 shall be interpreted as “nearby” and does not necessarily mean it is limited to the adjoining lot.

Substations are to be designed and constructed for the intended load associated with the building / development they are supplying. Substations are not to be initially built with increased capacity for adjacent buildings or developments.

Contestable Network Officer/Engineer will ensure the spare capacity in the existing substation has not been allocated to supply the existing development and other nearby development(s).

If there is an existing under utilised padmount or indoor substation in close proximity to and capable of supplying a new development, it may be used, provided the supply complies with relevant LV supply standards and policies. “Under utilised” also applies to the possibility of uprating a transformer to increase capability of supply.

Low voltage backup to multi-dwelling developments is to be considered as essential. Exemption will be considered where it is proven impracticable and is to be approved by Network Connections.

Proposals to utilise existing network assets shall be forwarded to Network Connections for assessment as part of connection of load application assessment. For all proposed load assessments, AS/NZ 3000 maximum demand calculations must be used as the proposed maximum consumer load for correctly sizing of CB and LV fuse strip in substations. ADMD is purely for voltage drop calculation and substation load assessment.

Implementation

The contents of this technical bulletin will be implemented immediately in any new designs submitted to Network Connections for certification.

Impacted Standards

The contents of this technical bulletin will be used to further clarify design requirements in MDI 0028 – Underground distribution network design when it is next reviewed.