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Solar PV Cable Compliance

AS/NZS 5033:2021 Installation and safety requirements for photovoltaic (PV) arrays.

This document has been produced in consultation with, and is endorsed by, electrical safety regulators in all Australian States and Territories, and in New Zealand, via their representatives on the Electrical Regulatory Authorities Council (ERAC).

The purpose of this document is to provide clarification on the requirements across Australia and New Zealand for the installation of above ground solar PV cable.

Installation requirements for the above ground use of solar PV cable.

Key Points

- PV d.c cables, where not installed underground, shall conform to the International Electrotechnical Commission standard IEC 62930 in accordance with Clause 4.4.2.1 of AS/NZS 5033:2021.

Note: Cables that conform to the International Electrotechnical Commission standard are **marked** with “**62930 IEC**” on the sheath.

Example markings are:

62930 IEC 131;

62930 IEC 132;

62930 IEC 133;

62930 IEC 134.

- Cables that are installed prior to the implementation date can remain and do not need to be replaced¹ (see footnote for state variations).
- Cables that conform **only** to IEC 62930 cannot be installed underground. For underground PV d.c installations, cables complying with a relevant standard applying to underground cables must be used.

Note: UL 493 may be useful for direct buried applications

Background

- AS/NZS 5033:2021 was published on the 19th November 2021 and came into effect on
 - NSW – 19th November 2021
 - Queensland – 19th May 2022

¹ Victorian installations will require [an exemption](#) to be issued by ESV

- ACT – 19th May 2022
 - Victoria – 19th May 2022
 - Tasmania – 01st June 2022
 - South Australia – 19th May 2022
 - Western Australia – 19th May 2022
 - Northern Territory – 19th May 2022
- IEC 62930 was published in December 2017 and subsequently replaced the previous standard.

For further enquiries or clarification relating to the contents of this document, please contact the relevant authority in your jurisdiction.

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