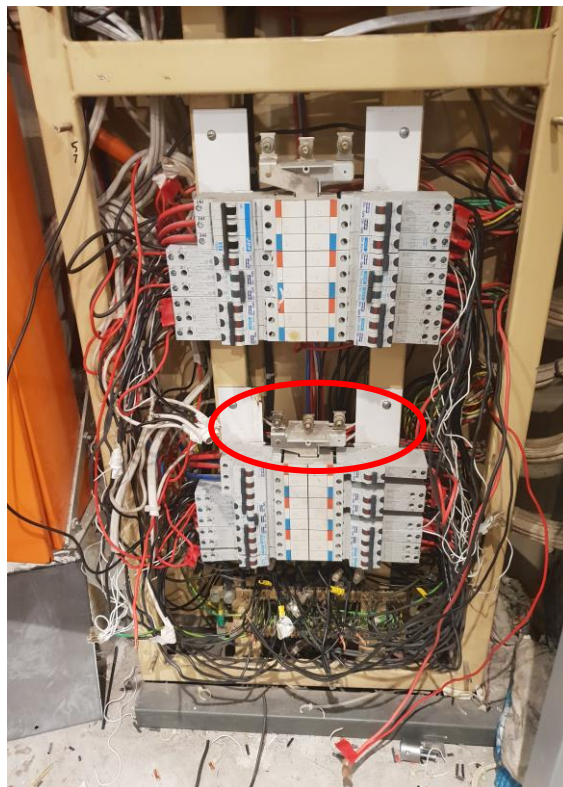


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Electrician receives fatal electric shock

01 April 2023

A 33-year-old electrician died from an electric shock while working on a switchboard and coming into contact with a live conductor. This is the second fatality relating to contact with electricity within a month in NSW.



Switchboard at which the incident occurred

Safety information

Work on energised (live) equipment is prohibited except under circumstances outlined in the WHS regulation. Before working on or near electrical equipment and installations, ensure that

The information contained in this publication is based on knowledge and understanding at the time of writing and the findings are not yet confirmed. SafeWork NSW has commenced an investigation in response to the incident to determine its cause and circumstances. No conclusions should be drawn from the information in this publication about the cause of the incident or the culpability of any party.

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it is switched off and test every circuit and conductor to ensure it has been properly isolated. Lock or tag the circuit to prevent accidental re-energisation.

Working de-energised eliminates significant electrical risks. The key steps for an effective isolation of electrical supply are:

- consultation: consult with the person who manages or controls the workplace or the premises (for example, to communicate the timing of the work) and notify any other affected people as appropriate
- isolation:
 - identify the circuit(s) requiring isolation
 - disconnect active conductors from the relevant source(s), noting there may be multiple sources and stand-by systems/generators/photovoltaic systems as well as auxiliary supplies from other boards
 - if a removable or rack out circuit breaker or combined fuse switch is used, it should be racked out or removed then locked open and danger tagged
 - each high-voltage exposed part must be earthed after proven de-energised.
- securing the isolation: lock the isolating switch(es) or remove and tie back relevant conductors to protect the people carrying out the electrical work
- tagging: tag the switching points where possible to provide general information to people at the workplace
- testing: test to confirm the relevant circuits have been de-energised along with any other relevant conductors in the work area, and re-test as necessary.

The safe work procedure 'Test for 'dead' before you touch' must be applied at all times.

Ensure:

- where possible, work de-energised. Work on energised (live) equipment is prohibited except under circumstances outlined in WHS regulation.
- minimise the risk by isolating or separating the hazard or hazardous work practice from any person exposed to it
- ensure there is adequate training provided by the person completing the works. Electrical work must only be carried out by a licenced or registered electrical worker

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- ensure there are first aid facilities provided at the workplace and each worker has access to the equipment
- ensure firefighting equipment that is suitable for electrical fires is accessible
- ensure energised conductors are isolated and/or insulated where necessary to prevent inadvertent contact or flashovers
- electrical work should be carried out from a position that minimises the risk of inadvertent contact with exposed energised parts and also the risk of an electric shock path being created
- PPE (for example protective eyewear, insulated gloves, hard hats, aprons and breathing protection) should be rated for the work to be done. If working on or near energised equipment (where permitted), Arc rated PPE must be provided and used to protect the user from the maximum expected energy available at the work site.

Related guidance material

- [Managing electrical risks in the workplace](#) – Codes of Practice
- [Work Health and Safety Regulation 2017](#) – NSW Legislation
- Lock Out Tag Out [Plant, Equipment and Machinery Energy Isolation Guidelines](#) – SafeWork NSW
- [Electrical Safety video](#) – SafeWork NSW
- [Electrical work guidance material](#) – SafeWork NSW
- [Electrical resources](#) – SafeWork NSW
- *AS/NZS 4836:2023 Safe working on or near low voltage electrical installations*

Further information

- [Traumatic event management plan - SafeWork NSW](#)
- [Mental health at work - NSW Government](#)
- [Speak Up Save Lives App - SafeWork NSW](#)
- [Subscribe to SafeWork NSW newsletters and updates](#)

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