

Field Engineering and Technology

Rollover and Revision of *Electrical Engineering* unit standards

Subfield	Domain	ID
Electrical Engineering	Core Electrical	15844, 15862, 29441
	Electrical Appliance Servicing	29421, 29427
	Electrical Installation and Maintenance	2016, 2020, 2021, 2030, 5931, 10787, 15869, 15870, 16415, 29419, 29422-29424, 29426, 29428, 29430-29436, 29438, 29439, 29446
	Electrical Machines	29420, 29443
	Electric Switchboards	29440
	Electrotechnology	29437

Waihangā Ara Rau Construction and Infrastructure Workforce Development Council has completed the rollover and revision of the unit standards listed above.

Summary

In 2021, the unit standards listed above were replaced by a new suite of unit standards. The last date of assessment for expiring unit standards was set at 31 December 2025.

In response to provider feedback, Waihangā Ara Rau Construction and Infrastructure Workforce Development Council has extended the last date of assessment for the expiring unit standards from 31 December 2025 to 31 December 2027 to align with the expiry date of the replaced qualification, the New Zealand Certificate in Electrical Engineering (Theory and Practice) (Level 4) [Ref: 2388].

Main changes

- All versions with the last date of assessment have been extended from 31 December 2025 to 31 December 2027.

Category D unit standards will expire at the end of December 2027.

Detailed list of unit standards – classification, title, level, and credits

Key to review category	
A	Dates changed, but no other changes are made - the new version of the standard carries the same ID and a new version number
B	Changes made, but the overall outcome remains the same - the new version of the standard carries the same ID and a new version number
C	Major changes that necessitate the registration of a replacement standard with a new ID
D	Standard will expire and not be replaced

Engineering and Technology > Electrical Engineering > Core Electrical

ID	Title	Level	Credit	Review Category
15844	Select and install flexible cords	3	2	D
15862	Demonstrate knowledge of industrial process control	4	2	D

ID	Title	Level	Credit	Review Category
29441	Demonstrate and apply knowledge of cable coding, colours, characters, applications, and capacity	4	2	D

Engineering and Technology > Electrical Engineering > Electrical Appliance Servicing

ID	Title	Level	Credit	Review Category
29421	Inspect, test, fault-find, and repair fixed-wired electrical appliances and portable appliances	3	3	D
29427	Install, test, and commission electrical appliances	4	2	D

Engineering and Technology > Electrical Engineering > Electrical Installation and Maintenance

ID	Title	Level	Credit	Review Category
2016	Install earthing systems for multiple earthed neutral installations	3	3	D
2020	Plan and install cable support systems	3	3	D
2021	Plan, install, and commission a power supply on a construction or demolition site	4	2	D
2030	Schedule and manage preventative maintenance for industrial electrical equipment	5	6	D
5931	Select and install domestic or commercial electric switchboards	4	3	D
10787	Install and test transducers	4	2	D
15869	Install electrical equipment in damp situations	4	3	D
15870	Inspect and test an electrical installation for compliance with AS/NZS 3000	4	5	D
16415	Install and commission extra-low voltage equipment	4	3	D
29419	Prepare for, install, test, and commission new electrical installations	4	10	D
29422	Install, wire, test and fault-find, and repair power outlets and electric lighting systems in existing installations	4	7	D
29423	Carry out planned maintenance of electrical equipment	4	3	D
29424	Install, commission, and maintain emergency lighting systems	4	2	D
29426	Follow a control drawing and install, wire, and commission a control panel	4	3	D
29428	Install, test, and commission a.c. rotating machines	4	2	D
29430	Select and install industrial electric switchboards	4	3	D
29431	Select and install electric motor starters	4	2	D
29432	Select, install, and commission a variable frequency drive	4	2	D
29433	Install, wire to, and connect a machine safety device	4	2	D
29434	Install and programme a PLC	4	2	D
29435	Install computer networking infrastructure systems	4	4	D
29436	Wire and connect control devices used in the electrical environment	4	4	D
29438	Install, commission, and maintain a power quality protection system	4	4	D
29439	Schedule and manage preventative maintenance for domestic or commercial electrical equipment	4	5	D
29446	Demonstrate knowledge of computer networking infrastructure principles	4	2	D

Engineering and Technology > Electrical Engineering > Electrical Machines

ID	Title	Level	Credit	Review Category
29420	Fault-find, test, and commission electric motors	4	4	D
29443	Demonstrate and apply knowledge of a.c. motors	4	4	D

Engineering and Technology > Electrical Engineering > Electric Switchboards

ID	Title	Level	Credit	Review Category
29440	Demonstrate knowledge of electric switchboards	4	3	D

Engineering and Technology > Electrical Engineering > Electrotechnology

ID	Title	Level	Credit	Review Category
29437	Analyse building and plant energy efficiency	4	3	D