



Uncertainty

**PAL RRP APP04 - Uncertainty appendix - Dec2020
- Public**

Revised regulatory proposal 2021–2026

Contents

1	SUMMARY	4
1.1	Summary of our revised proposal	4
2	NOMINATED PASS THROUGH EVENTS	5
2.1	Background.....	5
2.2	Rule requirements.....	5
2.3	Original proposal	6
2.4	Draft determination	10
2.5	Our response to the draft determination.....	11
3	CONTINGENT PROJECTS	22
3.1	Background.....	22
3.2	Rule requirements.....	22
3.3	Original proposal	24
3.4	Our response to the draft determination.....	24

1 Summary

The environment we operate within is inherently uncertain; events outside of our control can affect the quality, reliability and security of the services we provide to our customers. This has never been more so than during 2020. Whilst our revised proposal has been prepared using the best information available to us, we cannot control for every eventuality.

The uncertainty regime under the National Electricity Rules (**Rules**) comprises pass-through events, capital expenditure reopeners and contingent projects.

This section of our revised proposal responds to the draft determination with respect to the:

- pass through events that are to apply for the 2021–2026 regulatory control period in accordance with clause 6.5.10 of the Rules (nominated pass through events)
- contingent projects that are to apply for the 2021–2026 regulatory control period in accordance with clause 6.6A.1 of the Rules.

Both the nominated pass through event and contingent project mechanisms deal with expenditure that may be required during a regulatory period, but which is not able to be predicted with reasonable certainty at the time of preparing or submitting a regulatory proposal to the AER.

1.1 Summary of our revised proposal

1.1.1 Nominated pass through events

The draft determination accepted five of our proposed nominated pass through events (being, the insurer credit risk event, insurance coverage event, natural disaster event, terrorism event and retailer insolvency event) subject to amendments. Our major cyber event, act of aggression event and electric vehicle event were not accepted.¹ Our revised proposal accepts the draft determination, save for proposing minor revisions to the AER's definition of the insurance coverage event.

In addition, in responding to the draft determination regarding operating and capital expenditure, we are also proposing three new nominated pass through events, being an insurance premiums event, an environment protection event and a pole management practices event.

1.1.2 Contingent projects

Our original proposal did not include any contingent projects. In our revised proposal, we are proposing a contingent project in respect of the construction of the Ballarat West zone substation and associated rapid earth fault current limiters (**REFCLs**). This project was included in our capital expenditure forecast in our original proposal and was accepted in the draft determination (albeit with a reduced capital expenditure allowance). Given the uncertainties around the timing, nature and scope of the works, however, we consider the project should be included in the determination as a contingent project, rather than being reflected in the capital expenditure allowance.

In addition, we are proposing a contingent project in respect of works that may be required to accelerate the burying and insulation of remaining high-voltage bare-wire powerlines in the 33 highest bushfire risk areas across our network.

¹ AER, Draft Decision Powercor Distribution Determination 2021-26, 30 September 2020, Attachment 15, p. 15-4.

2 Nominated pass through events

2.1 Background

In providing for the pass-through mechanism, the Rules recognise that a prudent and efficient distributor can be exposed to risks beyond its control, which may have a material impact on its costs. A cost pass through enables a distributor to recover the costs of defined unpredictable, high-cost events, not built into a distribution determination.

2.2 Rule requirements

In addition to the pass through events contemplated by the Rules, clause 6.5.10(a) of the Rules provides that distributors can include 'nominated pass through events' in their regulatory proposals. In determining whether to accept a distributor's proposed nominated pass through event, the AER must take into account the 'nominated pass through event considerations' set out in the Rules.

The 'nominated pass through event considerations' are relevantly defined in chapter 10 of the Rules to be:

- whether the event proposed is an event covered by a category of pass through event specified in clause 6.6.1(a1)(1) to (4)
- whether the nature or type of event can be clearly identified at the time the determination is made for the service provider
- whether a prudent service provider could reasonably prevent an event of that nature or type from occurring or substantially mitigate the cost impact of such an event
- whether the relevant service provider could insure against the event, having regard to:
 - the availability (including the extent of availability in terms of liability limits) of insurance against the event on reasonable commercial terms; or
 - whether the event can be self-insured on the basis that:
 - it is possible to calculate the self-insurance premium; and
 - the potential cost to the relevant service provider would not have a significant impact on the service provider's ability to provide network services; and
- any other matter the AER considers relevant and which the AER has notified network service providers is a nominated pass through event consideration.
- In addition, the AER must:
 - perform or exercise a function or power under the National Electricity Law (**Law**) or the Rules that relates to the making of a distribution determination in a manner that will or is likely to contribute to the achievement of the national electricity objective (**NEO**)² and
 - in making a distribution determination, if there are two or more decisions that will or are likely to contribute to the achievement of the NEO, the AER must make the decision that it is satisfied will or is likely to contribute to the achievement of the NEO to the greatest degree.³

² Law, section 16(1)(a) and section 2(1) definition of 'AER economic regulatory function or power'.

³ Law, section 16(1)(d) and sections 2(1) and 71A definitions of 'reviewable regulatory decision'.

Finally, the AER must take into account the revenue and pricing principles when exercising a discretion in making those parts of a distribution determination relating to direct control network services.⁴ The revenue and pricing principles are set out in section 7A of the Law and relevantly include:

(2) A regulated network service provider should be provided with a reasonable opportunity to recover at least the efficient costs the operator incurs in–

(a) providing direct control network services; and

(b) complying with a regulatory obligation or requirement or making a regulatory payment.

(3) A regulated network service provider should be provided with effective incentives in order to promote economic efficiency with respect to direct control network services the operator provides. The economic efficiency that should be promoted includes–

(c) efficient investment in a distribution system ... with which the operator provides direct control network services; and

(d) the efficient provision of electricity network services; and

(e) the efficient use of the distribution system ... with which the operator provides direct control network services.

...

(5) A price or charge for the provision of a direct control network service should allow for a return commensurate with the regulatory and commercial risks involved in providing the direct control network service to which that price or charge relates.

2.3 Original proposal

Our original proposal included nominated pass through events for an insurer credit risk event, an insurance coverage event, a natural disaster event, a terrorism event, a retailer insolvency event, a major cyber event, an act of aggression event and an electric vehicle event.

The definitions we proposed in respect of each event are set out in the following table.

⁴ Law, section 16(2)(a).

Table 1 Nominated pass through events proposed in our original regulatory proposal

Nominated pass through event	Definition proposed in original proposal
Insurer credit risk event	<p>An insurer's credit risk event occurs if an insurer of Powercor becomes insolvent and as a result, in respect of an existing or potential insurance claim for a risk that was insured by the insolvent insurer, Powercor:</p> <ul style="list-style-type: none"> (a) is subject to a higher or lower claim limit or a higher or lower deductible than would have otherwise applied under the insolvent insurer's policy, or (b) incurs additional costs associated with funding an insurance claim, which would otherwise have been covered by the insolvent insurer. <p>Note: In assessing an insurer's credit risk event pass through application, the AER will have regard to, amongst other things:</p> <ul style="list-style-type: none"> (a) Powercor's attempts to mitigate and prevent the event from occurring by reviewing and considering the insurer's track record, size, credit rating and reputation (b) in the event that a claim would have been made after the insurance provider became insolvent, whether Powercor had reasonable opportunity to insure the risk with a different provider.
Insurance coverage event	<p>An insurance coverage event occurs if:</p> <ul style="list-style-type: none"> (a) Powercor makes a claim or claims and receives the benefit of a payment or payments under a relevant insurance policy or program of insurance policies (b) Powercor incurs costs beyond the policy limit, or which otherwise fall outside the scope of the cover provided, under the relevant insurance policy or policies (c) the costs beyond the policy limit, or otherwise outside the scope of the cover provided, under the relevant insurance policy or policies increase the costs to Powercor in providing direct control services. <p>For this insurance coverage event:</p> <ul style="list-style-type: none"> (a) a relevant insurance policy is an insurance policy held during the 2021–2026 regulatory control period or a previous regulatory control period in which Powercor was regulated (b) the scope of the cover provided by a relevant insurance policy or policies includes the bands of liability for which Powercor is insured. It does not include: <ul style="list-style-type: none"> (1) any liability beyond the policy limit of the policy or policies or (2) any range or band of liability within the policy limit for which Powercor is not insured by the policy or policies (c) Powercor will be deemed to have made a claim on a relevant insurance policy if the claim is made by a related party of Powercor in relation to any aspect of the Network or Powercor's business. <p>Note in assessing an insurance coverage event pass through application the AER will have regard to:</p> <ul style="list-style-type: none"> (a) the insurance policy or policies for the event (b) the level and scope of insurance cover that would be obtained, and the risks that would be insured against, by an efficient and prudent NSP in respect of the event (c) prevailing conditions in the global insurance market at the time the policy or program of policies was obtained.

Nominated pass through event	Definition proposed in original proposal
Natural disaster event	<p>Natural disaster event means any natural disaster including but not limited to cyclone, fire, flood or earthquake that occurs during the 2021–26 regulatory control period that increases the costs to Powercor in providing direct control services, provided the cyclone, fire, flood, earthquake or other event was not directly and solely caused by Powercor’s negligent or unlawful acts or omissions.</p> <p>Note: In assessing a natural disaster event pass through application, the AER will have regard to, amongst other things:</p> <ul style="list-style-type: none"> (a) whether Powercor has insurance against the event (b) the level of insurance that an efficient and prudent NSP would obtain in respect of the event (c) whether a relevant government authority has made a declaration that a natural disaster has occurred.
A terrorism event	<p>Terrorism event means an act (including, but not limited to, the use of force or violence or the threat of force or violence, attacks or other disruptive activities against critical infrastructure or underlying technology, or the threat of such attacks or disruptive activities, or the deliberate introduction of malware) of any person or group of persons (whether acting alone or on behalf of or in connection with any organisation or government), which:</p> <ul style="list-style-type: none"> (a) from its nature or context is done for, or in connection with, political, religious, ideological, ethnic or similar purposes or reasons (including the intention to influence or intimidate any government and/or put the public, or any section of the public, in fear); and (b) increases the costs to Powercor in providing direct control services. <p>Note: In assessing a terrorism event pass through application, the AER will have regard to, amongst other things:</p> <ul style="list-style-type: none"> (a) whether Powercor has insurance against the event (b) the level of insurance that an efficient and prudent DNSP would obtain in respect of the event (c) whether a declaration has been made by a relevant government authority that an act of terrorism has occurred.
Retailer insolvency event	<p>Until such time as the National Energy Retail Law set out in the Schedule to the National Energy Retail Law (South Australia) Act 2011 of South Australia is applied as a law of Victoria, retailer insolvency event has the meaning set out in the NER as in force from time to time, except that:</p> <ul style="list-style-type: none"> (a) where used in the definition of 'retailer insolvency event' in the NER, the term 'retailer' means the holder of a licence to sell electricity under the Electricity Industry Act 2000 (Vic) (b) other terms used in the definition of retailer insolvency event in the Rules as a consequence of amendments made to that definition from time to time, which would otherwise take their meaning by reference to provisions of the NER or National Energy Retail Law not in force in Victoria, take their ordinary meaning and natural meaning, or their technical meaning (as the case may be). <p>For the purposes of this definition, the terms 'eligible pass through amount' and 'positive change event' where they appear in the NER are modified in respect of this retailer insolvency event in the same manner as those terms are modified in respect of the retailer insolvency event prescribed in the NER from time to time. Other terms defined in the NER for this purpose (including without limitation 'retailer insolvency costs', 'failed retailer' and 'billed but unpaid charges') which would otherwise take their meaning by reference to provisions of the NER or National Energy Retail Law not in force in Victoria, take their ordinary and natural meaning, or their technical meaning (as the case may be).</p> <p>Note: This retailer insolvency event will cease to apply as a nominated pass through event on commencement of the National Energy Retail Law in Victoria.</p>

Nominated pass through event	Definition proposed in original proposal
Major cyber event	<p>Major cyber event' means any significant interruption to the technology systems or assets used by Powercor to provide direct control services occurring during the 2021–2026 regulatory control period that materially increases the costs to Powercor in providing direct control services, provided that:</p> <ul style="list-style-type: none"> (a) the interruption was caused by an act of a third party (b) the event does not constitute a 'terrorism event'. <p>Note: In assessing a major cyber event pass through application, the AER will have regard to, amongst other things:</p> <ul style="list-style-type: none"> (a) whether Powercor has insurance against the event (b) the level of insurance that an efficient and prudent DNSP would obtain in respect of the event (c) whether the steps taken by Powercor to prevent the event from occurring are consistent with the steps that an efficient and prudent DNSP would have taken in the circumstances to prevent the occurrence of the event (d) whether the steps taken by Powercor to mitigate the cost impact of the event are consistent with the steps that an efficient and prudent DNSP would have taken in the circumstances to mitigate the cost impact of the event.
Act of aggression event	<p>Act of aggression event means:</p> <ul style="list-style-type: none"> (a) an event that constitutes an international armed conflict (within the meaning given to that term by the Geneva Conventions and associated Protocols) involving Australia; (b) an event that constitutes a non-international armed conflict (within the meaning given to that term by the Geneva Conventions and associated Protocols) occurring in Australia; or (c) an act of aggression (within the meaning given to that term by United Nations General Assembly resolution 3314 (XXIX) of 14 December 1974) against Australia, <p>which occurs during the 2021–2026 regulatory control period and materially increases the costs to Powercor in providing direct control services.</p> <p>Note: In assessing an act of aggression event pass through application, the AER will have regard to, amongst other things:</p> <ul style="list-style-type: none"> (a) whether Powercor has insurance against the event (b) the level of insurance that an efficient and prudent distributor would obtain in respect of the event
Electric vehicle event	<p>An electric vehicle event occurs if a government announcement directly related to increased electric vehicle uptake occurs during the 2021–2026 regulatory period that materially increases localised electricity demand</p> <p>Note: In assessing an electric vehicle risk event pass through application, the AER will have regard to, amongst other things:</p> <ul style="list-style-type: none"> (a) Powercor's attempts to mitigate the impact of the event on localised electricity demand (b) whether the event already satisfies a regulatory change event in the Rules

Source: Powercor

2.4 Draft determination

2.4.1 Pass through events

The draft determination accepted five of our proposed nominated pass through events (being, the insurer credit risk event, insurance coverage event, natural disaster event, terrorism event and retailer insolvency event) subject to amendments. The AER did not accept our major cyber event, act of aggression event or electric vehicle event.⁵

A summary of the draft determination in respect of each of the nominated pass through events we proposed in our original proposal is given in the below table.

Table 2 Summary of draft determination in respect of nominated pass through events

Event	Changes proposed in original proposal	Draft determination
Insurer credit risk event	Consistent with current definition and definition accepted by AER in recent regulatory decisions	Accepted
Insurance coverage event	Amendment from the current 'insurance cap event' having regard to the changes and challenges in the global insurance market that have increased the risk of inability to obtain the full level or scope of cover under relevant insurance policy or policies	Further amendment to the definition to allow for changes to insurance coverage where there are 'changed circumstances' Requested submissions on further amendments to the definition proposed by Jemena
Natural disaster event	Minor amendment to current definition and consistent with recent AER regulatory decisions	Further amendment to the definition in respect of how it applies to events caused by our acts or omissions
A terrorism event	Current definition amended to include specific reference to cyber terrorism	Our change was not accepted
Retailer insolvency event	Minor amendment from current definition having regard to the current definition of the retailer insolvency event in the Rules	Slight amendment to the event's definition to reflect legislative changes
Major cyber event	Additional event with definition that addresses AER reservations expressed in recent decisions	Not accepted
Act of aggression event	Additional event added with definition that addresses AER reservations with this event expressed in recent regulatory decisions	Not accepted
Electric vehicle event	Additional event added to address the uncertainty with electric vehicle uptake	Not accepted

Source: Powercor

⁵ AER, Draft Decision Powercor Distribution Determination 2021-26, 30 September 2020, Attachment 15, p. 15-4.

2.5 Our response to the draft determination

Our revised proposal accepts the draft determination regarding the pass through events in our original proposal, save for proposing minor revisions to the AER's definition of the insurance coverage event.

In addition, in responding to the draft determination regarding operating and capital expenditure, we are also proposing three new nominated pass through events, being an insurance premiums event, an environment protection event and a pole management practices event.

2.5.1 Insurance coverage event

The AER accepted our proposal to include an insurance coverage event in the distribution determination, but adopted a definition for the event consistent with recent determinations for SA Power Networks, Ergon Energy and Energex. The AER also invited us to express views on amendments to the AER's definition proposed by Jemena as part of the draft determination consultation.⁶

We agree with the changes proposed by Jemena and propose only further minor amendments to the definition by way of clarification. Our proposed insurance coverage event is set out in Table 3 below. The event is Jemena's proposed insurance coverage event set out in Appendix A of Attachment 15 of the draft determination, with our suggested additions to Jemena's drafting underlined.

⁶ AER, Draft Decision Powercor Distribution Determination 2021-26, 30 September 2020, Attachment 15, pp. 15-13-15-14.

Table 3 Insurance coverage event definition

Nominated pass through event	Definition proposed in revised proposal
Insurance coverage event	<p>An insurance coverage event occurs if:</p> <ol style="list-style-type: none"> 1. Powercor: <ol style="list-style-type: none"> a) makes a claim or claims and receives the benefit of a payment or payments under a relevant insurance policy or set of insurance policies; or b) would have been able to make a claim or claims under a relevant insurance policy or set of insurance policies but for changed circumstances; and 2. Powercor incurs costs: <ol style="list-style-type: none"> a) beyond a policy limit for the relevant insurance policy or set of insurance policies ; or b) that are unrecoverable under the relevant insurance policy or set of insurance policies (whether wholly or in part) due to changed circumstances; and 3. The costs referred to in paragraph 2 above, <u>either separately or in aggregate</u>, materially increase the costs to Powercor in providing direct control services. <p>For the purposes of this insurance coverage event:</p> <ul style="list-style-type: none"> • <u>'base year' means the year used by the AER in the distribution determination as the base year to forecast operating expenditure in the 2021-26 regulatory control period.</u> • <u>'changed circumstances' means movements in the relevant insurance liability market since the acquisition of the insurance policy or set of insurance policies that applied during the majority of the base year that are beyond the reasonable control of Powercor, where those movements result in it no longer being possible for Powercor to take out with a reputable insurer:</u> <ol style="list-style-type: none"> i. a relevant insurance policy or, ii. in the case of a set of insurance policies, one or more layers of insurance within that set (or there are otherwise one or more gaps within the set), <p>either at all or on reasonable commercial terms.</p> • <u>'costs' means the amount that would have been recoverable under the relevant insurance policy or set of insurance policies had:</u> <ol style="list-style-type: none"> i. the limit not been exhausted; or ii. those costs not been unrecoverable due to changed circumstances. • <u>'reputable insurer' means an insurer with a current financial security rating of "A-" or better by Standard and Poor's (or the equivalent rating with another reputable rating agency).</u> • <u>A relevant insurance policy or set of insurance policies is an insurance policy or set of insurance policies held during the regulatory control period or a previous regulatory control period in which Powercor was regulated.</u> • <u>Powercor will be deemed to have made a claim on a relevant insurance policy or set of insurance policies if the claim is made by a related party of Powercor in relation to any aspect of Powercor's network or business.</u> <p>Note for the avoidance of doubt, in assessing an insurance coverage event through application under rule 6.6.1(i), the AER will have regard to:</p> <ul style="list-style-type: none"> • The relevant insurance policy or set of insurance policies for the event; • The level of insurance that an efficient and prudent DNSP would obtain, or would have sought to obtain, in respect of the event; and • <u>Any guidance published by the AER on matters the AER will likely have regard to in assessing any insurance coverage event that occurs; and</u> • Any information provided by Powercor to the AER about Powercor's actions and processes.

Source: Powercor

The basis for the insurance coverage event is discussed in the insurance business case 9.05, submitted with this revised proposal.

2.5.2 Insurance premiums event

As discussed in the insurance appendix, there has been a major withdrawal of insurance capacity globally for bushfire liability risks, due to a combination of insurer consolidation, appetite changes and (re)insurers being more selective in how they deploy their capacity. As a result of these changes in the insurance market, there will be a material and sustained increase in insurance premiums, as well as a decrease in the availability of insurance, in the next regulatory period.

We accept that forecasting insurance premiums is difficult. Accordingly, we are proposing:

- a step change to reflect the higher expected insurance premiums in the next regulatory period, based on the actual premium amounts incurred in the 2020/21 insurance year (rather than the expected increases as forecast by Marsh)
- an insurance premiums pass through event, to ensure that if premium increases result in the costs of direct control services increasing materially, we are provided with an opportunity to recover at least our efficient costs.

The background to the insurance premiums pass through event, the reasons why it is required to ensure we are provided with the reasonable opportunity to recover our prudent and efficient costs and the reasons it delivers appropriate regulatory outcomes in the face of the uncertainty over insurance premiums in the next regulatory period, are discussed in the insurance business case 9.05 submitted with this revised proposal.

Proposed nominated pass through event

Table 4 Insurance premiums event definition

Nominated pass through event	Definition
Insurance premiums event	<p>An insurance premiums event occurs if Powercor incurs costs in procuring general liability insurance products during the 2021-26 regulatory control period which exceed the allowance for general liability insurance products included in the forecast operating expenditure allowance approved in the AER's distribution determination for the 2021–26 regulatory control period for the relevant regulatory year.</p> <p>Note: In making a determination on an insurance premiums event, the AER will have regard to, amongst other things:</p> <ol style="list-style-type: none"> the level of general liability insurance cover that an efficient and prudent DNSP operating a network similar to Powercor's would obtain in respect of liability exposure; any guidance published by the AER on matters the AER will likely have regard to in assessing any insurance premiums event that occurs; and any information provided by Powercor to the AER about Powercor's actions and processes.

Source: Powercor

Insurance premiums event satisfies the nominated pass through event considerations

Our proposed event definition is consistent with the nominated pass through event considerations as:

- the event is not covered by a category of pass through event specified in clause 6.6.1(a1)(1) to (4) of the Rules
- the event definition means that the event can be clearly identified at the time the determination is made

- as outlined in the insurance business case, despite extensive bushfire mitigation strategies, we cannot prevent the increase in the price of insurance premiums from occurring or further mitigate the cost impact of such an event
- it is not possible to insure against further rises in the price of insurance in bushfire prone areas
- as discussed in the insurance business case, wholly self-insuring for general liability would require us to hold significant capital funds to enable the making of payments to claimants and continue providing network services, which would lead to significantly higher costs of providing services compared to these risks being managed by the procurement of an appropriate level of insurance cover. It would also not be consistent with good governance and is not a commercially realistic option not to hold adequate liability insurance given our debt investors expect us to have adequate insurance cover.

2.5.3 Environment protection event

Background

We are subject to both Victorian and Commonwealth environmental obligations, including the *Environment Protection Act 1970* (Vic) (**EP Act 1970**) and the State Environment Protection Policies for noise, land, groundwater, surface water and air quality.

Historically, we have managed the risks associated with our environmental obligations primarily through a reactive approach consistent with the prevailing legislation. For example, we have investigated noise concerns associated with our zone substation transformers following a customer complaint.

In 2018, the Victorian Government passed the *Environment Protection Amendment Act 2018* (Vic) (**EP Amendment Act**). On the commencement of the EP Amendment Act, the EP Act 1970 will be repealed and replaced by a set of amendments to the *Environment Protection Act 2017* (Vic) (**New EP Act**). The New EP Act was due to commence in July 2020, along with various regulations and other instruments (**Subordinate Instruments**) (together, **New EP Regime**). As set out in the Regulatory Impact Statement (**RIS**), these revisions establish a modern regulatory regime focusing on preventing waste and pollution impacts, rather than managing any impacts after an event has occurred.⁷ The amendments are intended to shift from a 'reactive' regulatory framework to a 'proactive' framework including by the:

- imposition of a 'general environmental duty' which, relevantly, requires systems to be put in place to prevent pollution.
- imposition of specific duties to manage contaminated land and to notify the Environmental Protection Authority Victoria of specific contaminated sites.
- codification and augmentation of the existing noise framework, including by imposition of a night noise limit and giving force of law to the existing non-binding guidelines in regional Victoria.

The Victorian Government is proposing the new laws be supported by:

- Environment Protection Regulations
- Environment Reference Standard (**ERS**)
- Regulatory Impact Statement (**RIS**)
- Impact assessment

⁷ PAL ATT010: Deloitte, Regulatory impact statement: proposed environment protection regulations, DELWP and EPA, August 2019, p. 7.

In September 2019, the Department of Environment, Land, Water and Planning (**DELWP**) and the EPA published, among other documents:

- draft Environment Protection Regulations (which will be made under section 465 of the amended New EP Act) together with an associated RIS
- draft Environment Protection Transitional Regulations (which will be made under section 502 of the amended New EP Act)
- a draft Environment Reference Standard (which will be made under section 93 of the amended New EP Act)
- a draft Noise Limit and Assessment Protocol (which is a document to be published by the EPA under the Environment Protection Regulations).

However, in response to the impact of coronavirus (**COVID-19**) on businesses, the commencement of the EP Amendment Act was amended by the *COVID-19 Omnibus (Emergency Measures) Act 2020* (Vic) (**COVID-19 Act**). Section 54 of that Act:

- revoked the proclamation of commencement of the EP Amendment Act made on 3 March 2020
- provides that, except for those provisions expressly provided for in the COVID-19 Act, the EP Amendment Act comes into operation on a day to be proclaimed
- provides that, if a provision of the EP Amendment Act does not come into operation by 1 December 2021, it comes into operation on that day (this end date was previously 1 December 2020).

There has not yet been a new proclamation made. However, we understand the intention is that the relevant provisions of the EP Amendment Act will commence on 1 July 2021.⁸ In addition, whereas we previously expected the Subordinate Instruments to be finalised in May 2020, in response to the postponement of the commencement of the EP Amendment Act, the Victorian Government has advised that regulations and standards will be made closer to the new commencement date.⁹

Our original proposal included capital expenditure and an operating expenditure step change in respect of compliance with the New EP Regime. However, after the deferral of the commencement of that legislation, we withdrew our proposed capital and operating expenditure associated with the changes.¹⁰ As a result, the AER did not include the expenditure proposed in respect of compliance with the New EP Regime within its alternative estimates of capital and operating expenditure in the draft determination.

We anticipate that the EP Amendment Act will now repeal the EP Act 1970 from 1 July 2021 and establish, in the form of the New EP Regime, a proactive regulatory approach to preventing waste and pollution impacts (rather than managing the impacts after they occur). However, the commencement date has not yet been proclaimed and no further information regarding the Subordinate Instruments has been made available.

Given that there is still considerable uncertainty with respect to the required capital expenditure we will incur in compliance with the New EP Regime, we consider that the expenditure is the proper subject of a cost pass through event, rather than forming part of the expenditure forecast in our revised proposal.

⁸ See for example: DELWP, *Environment Protection Amendment Act*, 23 April 2020 <<https://www.environment.vic.gov.au/sustainability/environment-protection-reform/ep-bill-2018>; Environment Protection Authority Victoria, *Changing to the Environment Protection Amendment Act 2018* <<https://www.epa.vic.gov.au/about-epa/laws/new-laws/changing-to-the-new-act>>.

⁹ See: Environment Protection Authority, *Proposed regulations and environment reference standards* <<https://engage.vic.gov.au/new-environmental-laws/subordinate-legislation>>.

¹⁰ CitiPower, Powercor and United Energy, *Amendments to operating expenditure step changes and capital programs*, 15 May 2020, pp. 1-2.

Cost impact of these changes

Whilst we do not yet have clarity on precisely the measures we will have to implement to comply with the New EP Regime (as these measures are not yet finalised), we expect our costs to include at least those elements discussed below.

Operating expenditure

The move to a proactive regulatory framework will require us to conduct more site tests, assessments and maintain this information on an ongoing basis to develop a risk-assessment framework and related mitigation plans and systems. The risk-assessment framework is necessary for reducing risk of environmental harm so far as reasonably practicable.¹¹ Remediation activity is also expected to increase substantially due to a new obligation to minimise all risks of harm to human health and the environment from contaminated land.¹²

Based on the new obligations and the expectations under the RIS, we estimate the following on-going activity will increase as a result of the new obligations and from the new risk-assessment framework:

- remediation of contaminated land, including oil removal and clean-up activities
- removal of asbestos, lead paint and PCBs.

Bunding

The New EP Regime also requires us to prevent harm so far as reasonably practicable.¹³ Transformers in zone substations present the greatest risk to environmental protection, in the form of soil contamination. This is due to the risk of transformers leaking material volumes of oil as their condition deteriorates. One of the most effective treatments for transformer oil leak risk is to contain and treat leaks via bund walls. A bund wall is a complete enclosure built around the transformer that contains any oil spills within the wall boundary until such time that they can be treated or removed. Coupled to this is the treatment of water at the site to separate oil from water before it enters the storm water or ground water.

We install bunding and drainage at new zone substations, when replacing and upgrading transformers and in cases of serious leaks and risk of water drainage. However, in light of the requirements of the New EP Regime, we have developed a program of works to install or upgrade bunding at all existing transformers over time. This will significantly reduce the risk of oil contamination, which is consistent with the EP Amendment Act 2018 and the draft regulations.

Noise compliance

The New EP Regime will establish offences of ‘unreasonable noise’ and ‘aggravated noise’ by non-residential premises in major urban areas and in rural areas, and introduce new night time limits and the consideration of the frequency spectrum.¹⁴

We have conducted a desktop risk-assessment to identify the potential non-compliant zone substations with regard to the new night time limits. These are based on indicative night time emission limit exceedances from previous studies. Sites with indicative night-time noise exceedances are considered to be high-risk, and as such were included in the phased planned works for mitigation over the 2021–2026 regulatory period.

¹¹ This duty arises from the new General Environmental Duty: New EP Act, section 25(1).

¹² This duty arises from the new Duty to Manage: New EP Act, section 39(1).

¹³ This duty arises from the new General Environmental Duty: New EP Act, section 25(1).

¹⁴ New EP Act, sections 166 and 168.

We engaged GHD Pty Ltd (**GHD**) to undertake a cost feasibility assessment for mitigating noise across those higher risk zone substitutions in our network¹⁵. To identify and assess various options, GHD completed structural design and noise modelling to assess the feasibility of various noise mitigation solutions. GHD also engaged with an external quantity surveyor to obtain an understanding of indicative costs associated with each solution provided. The estimated capital expenditure represents the least-cost option identified by GHD for each site.

Proposed expenditure

Table 5 Environment protection required works

Description	Investment (\$million, 2019)
Operating expenditure	9.15
Bunding compliance program	16.56
Noise compliance program	29.28
Total	54.99

Source: Powercor

Proposed nominated pass through event

We consider that the commencement of the New EP Regime may constitute a 'service standard event', or failing that, a 'regulatory change event' as defined in the Rules. However, in light of the unprecedented impact COVID-19 has had on the progression of the New EP Regime, to put beyond doubt that the costs associated with the New EP Regime are recoverable, we are seeking a nominated pass through event for the 2021-2026 regulatory period. The definition we propose is below.

Table 6 Environment protection event definition

Nominated pass through event	Definition
Environment protection event	<p>An environment protection event occurs when Powercor has:</p> <ul style="list-style-type: none"> a) prepared, and approved internally, a compliance plan for meeting the requirements of the Amended EPA, including any instrument made or issued under the Amended EPA and any direction, order or notice issued or decision made pursuant to the Amended EPA or instrument made or issued under the Amended EPA; and b) prepared a forecast of the capital and operating expenditure required to carry out the compliance plan. <p>For the purposes of this environment protection event:</p> <ul style="list-style-type: none"> • 'Amended EPA' means the <i>Environment Protection Act 2017 (Vic)</i> as amended by the <i>Environment Protection Amendment Act 2018 (Vic)</i>

Source: Powercor

¹⁵ For the full GHD report refer to PAL ATT038.

Environment protection event satisfies the nominated pass through event considerations and is consistent with the Rules and Law

As noted above, while we consider that the commencement of the New EP Regime may constitute a 'service standard event', or failing that, a 'regulatory change event' as defined in the Rules, in light of the unprecedented impact COVID-19 has had on the progression of the New EP Regime, to put beyond doubt that the costs associated with the New EP Regime are recoverable, we are seeking a nominated pass through event for the 2021-2026 regulatory period.

The nominated pass through event considerations include, 'whether the event proposed is an event covered by a category of pass through event specified in clause 6.6.1(a1)(1) to (4)'. We note in this regard that, if a proposed nominated pass through event does not satisfy a nominated pass through event consideration, this does not preclude the AER from including the event in a distribution determination. The considerations are simply matters that the AER must 'take into account' in making its determination.¹⁶

To the extent the AER considers one of the prescribed pass through events does apply to the New EP Regime changes in their entirety, and we are entitled to seek recovery of our costs under one of the prescribed pass through event provisions after the content of the New EP Regime is known with greater certainty, we would welcome the AER's decision in that regard.

Our proposed event definition is consistent with the balance of the nominated pass through event considerations as:

- the event definition means that the event can be, and is, clearly identified
- the form of the New EP Regime and the subsequent proactive steps required of us are matters outside of our control. Whilst to date, we have invested in and maintained our network as prudently and efficiently as possible, we cannot mitigate against the commencement of changing obligations
- the event is not an eventuality that we could insure against
- we have not been notified of any other relevant nominated pass through event considerations by the AER.

Should the proposed event not be covered by a 'service standard event', or 'regulatory change event' as defined in the Rules, in the absence of the nominated environment protection event, we will not be afforded a reasonable opportunity to recover our efficient costs of compliance with the New EP Regime, as provided for in the Law.¹⁷

2.5.4 Pole management practices event

We are subject to section 98 of the *Electricity Safety Act 1998* (Vic) which obliges us to design, construct, operate, maintain and decommission our supply network to minimise as far as practicable:

- the hazards and risks to the safety of any person arising from the supply network; and
- the hazards and risks of damage to the property of any person arising from the supply network; and
- the bushfire danger arising from the supply network.

¹⁶ Rules, clause 6.5.10. See also: AEMC, *Rule Determination, National Electricity Amendment (Cost pass through arrangements for Network Service Providers) Rule 2012*, 2 August 2012, 7, which states: "The nominated pass through event considerations are only intended to be high level considerations rather than to operate individually as an explicit basis to accept or reject a cost pass through. This is because different pass through events will require different weight to be given to different considerations".

¹⁷ Law, sections 7A, 16(2)(a).

Our customers consider maintaining the safety of our network to be our core business and have indicated that it should be one of our greatest priorities.

These considerations have led to us reconsidering our pole management practices. The pole management program proposed in our revised proposal will allow us to comply with our safety obligations, as well as meet community expectations in relation to a sustainable asset management program over the longer-term.

Our original proposal

In our original proposal, we forecast our wood pole replacement and reinforcement requirements based on changes to our asset management practices, following two comprehensive reviews by Energy Safe Victoria (ESV).¹⁸ Consistent with ESV's recommendations, the risk-based asset management approach proposed in our original proposal aligns with the conceptual framework set out in the AER's recent asset replacement guidance practice note.¹⁹ Further detail is given in our pole replacement business case.²⁰

The draft determination

Stakeholders, including the AER, broadly accepted the need for an increase in our pole intervention volumes. Notwithstanding this, further information was requested to support our forecast in full, including cost-benefit analysis demonstrating the expected risk reduction from our pole program and updated forecasts to reflect the outcomes from recent field trials. In the absence of such further information, the AER developed a substitute forecast based on our 2013 expenditure, plus an allowance to address what it considered a 'backlog' of poles not replaced during the period 2014–2018. The AER also applied a capital expenditure sharing scheme (CESS) reduction.

Our revised regulatory proposal

In this revised proposal, we have refined our wood pole intervention forecast, and are now proposing less expenditure than in our original proposal. The changes to our forecast are based on additional information from our field trial, changes to our visual inspection criteria and the development of our risk model.²¹

ESV has now accepted our pole management improvement plan. This plan is reflected in our revised proposal and we are planning to submit a revised Bushfire Mitigation Plan (**BMP**) in December 2020 that reflects the approved plan. However, it is not guaranteed that ESV will accept our revised BMP. Should ESV make further recommendations or otherwise require action in relation to our pole management practices, we need to ensure we are able to recover our costs of responding to these recommendations or requirements and complying with our safety obligations. Given the findings of ESV, and the form any recommendations or actions required will take, are currently unknown, we are proposing a nominated pass through event to enable us to recover any additional pole management expenditure required following ESV's review of our proposed BMP and improved pole management practices.

Proposed nominated pass through event

We are proposing a nominated pass through event to ensure we continue to be able to comply with our regulatory obligation to operate and maintain our network to minimise, as far as possible, any risk to the safety

¹⁸ PAL ATT133: ESV, *The condition of power poles in south west Victoria, Technical investigation report*, July 2019; PAL ATT176: ESV, *Draft report: Powercor wood pole management, An assessment of sustainable wood pole safety outcomes, Public technical report*, December 2019.

¹⁹ PAL ATT099: Australian Energy Regulator, *Industry practice application note: asset replacement planning*, January 2019.

²⁰ PAL BUS 4.02: Powercor, *Pole replacement forecast*, January 2020.

²¹ For more information, please see our revised Poles chapter.

of our customers, damage to their property, or any bushfire danger.²² If ESV does make further recommendations or require action in respect of our pole management practices, we need to be able to implement these recommendations and recover our efficient costs of doing so.

The definition we propose is below.

Table 7 Pole management practices event definition

Nominated pass through event	Definition
Pole management practices event	<p>A pole management practices event occurs if:</p> <ol style="list-style-type: none"> 1. Energy Safe Victoria has made a recommendation or recommendations or otherwise requires Powercor to take action in respect of Powercor's pole management practices; and 2. Powercor has prepared, and approved internally, changes to its pole management practices in response to the matters referred to in paragraph 1 above; and 3. Powercor has completed a forecast of pole management costs that it is likely to incur as a result of its changed pole management practices that are additional to the pole management costs that were included in the capital expenditure forecast in the AER's distribution determination for the 2021-26 regulatory control period.

Source: Powercor

Pole management practices event satisfies the nominated pass through event considerations and is consistent with the Rules and Law

As noted above, one of the nominated pass through event considerations is whether the event proposed is an event covered by a category of pass through event specified in the Rules. Given the uncertainty as to what will transpire upon ESV considering our proposed BMP, it is unclear whether the pass through events defined in the Rules will enable us to recover our prudent and efficient costs of responding to any ESV recommendations or other required actions in relation to our pole management practices. A nominated pass through event is therefore required to ensure we will be provided with a reasonable opportunity to recover our efficient costs of complying with section 98 of the *Electricity Safety Act 1998* (Vic).²³

In any event, even if a proposed nominated pass through event does not satisfy a nominated pass through event consideration, this does not preclude the AER from including the event in a distribution determination. The considerations are simply matters that the AER must 'take into account' in making its determination.²⁴ The fact that we *may* be able to rely on the cost pass through events defined in the Rules does not prevent the AER from including our proposed nominated pass through event in the determination to put beyond doubt that we will be provided with the opportunity to recover our efficient costs of complying with applicable safety obligations.

Our proposed event definition is consistent with the balance of the nominated pass through event considerations as:

²² In accordance with section 98 of the *Electricity Safety Act 1998* (Vic). This obligation is a regulatory obligation or requirement as it is a distribution system safety duty, being a duty or requirement under the *Electricity Safety Act 1998* (Vic) which is an act of Victoria, a participating jurisdiction, relating to the safe distribution of electricity in that jurisdiction and the safe operation of a distribution system in that jurisdiction: Law, section 2D and definition of 'distribution system safety duty'.

²³ Law, sections 7A, 16(2)(a).

²⁴ Rules, clause 6.5.10. See also: AEMC, *Rule Determination, National Electricity Amendment (Cost pass through arrangements for Network Service Providers) Rule 2012*, 2 August 2012, 7, which states: "The nominated pass through event considerations are only intended to be high level considerations rather than to operate individually as an explicit basis to accept or reject a cost pass through. This is because different pass through events will require different weight to be given to different considerations".

- the event definition as drafted means that the event can be, and is, clearly identified
- whilst we have appropriately management our pole assets to date, we cannot prevent ESV recommending that more stringent practices are required in order for us to continue to operate and maintain our network to minimise, as far as possible, any risk to the safety of our customers, damage to their property, and any bushfire danger. Given the risks posed to our customers and the wider community, it would be inappropriate not to put such recommendations into practice
- the event is not a circumstance that we could insure against
- we have not been notified of any other relevant nominated pass through event considerations by the AER.

3 Contingent projects

3.1 Background

The Rules provide for regulatory proposals to include proposed contingent capital expenditure which the distributor considers is reasonably required for the purpose of undertaking a proposed contingent project.²⁵ A contingent project is a project that is reasonably required to be undertaken, but which is excluded from a distributor's general capital expenditure allowance because of uncertainty about its requirement, timing or costs.

In comparison to a cost pass through, contingent projects are intended to apply to matters which are more specific to a particular business and more likely to occur.²⁶

3.2 Rule requirements

A regulatory proposal may include proposed contingent capital expenditure which the distributor considers is reasonably required for the purpose of undertaking a proposed contingent project.²⁷ Clause S6.1.3(14) of the Rules requires a distributor that is seeking a proposed contingent project for the purposes of the relevant distribution determination to provide in its building block proposal:

- a description of the proposed contingent event, including reasons why the distributor considers the project should be accepted as a contingent project for the regulatory proposal
- a forecast of the capital expenditure that the distributor considers is reasonably necessary for the purpose of undertaking the proposed contingent project
- the methodology used for developing the forecast and the key assumptions that underlie it
- information that demonstrates that the undertaking of the proposed contingent project is reasonably required in order to achieve one or more of the capital expenditure objectives
- information that demonstrates that the proposed contingent capital expenditure complies with the requirements set out in clause 6.6A.1(b)(2)
- the trigger events which are proposed in relation to the proposed contingent project and an explanation of how each of those conditions or events addresses the matters referred to in clause 6.6A.1(c).

Our distribution determination for the 2021-2026 regulatory control period will be predicated on constituent decisions including the AER's determination in respect of:²⁸

- whether each of the proposed contingent projects described in the regulatory proposal are contingent projects for the purposes of the distribution determination, in which case the decision must clearly identify each of those contingent projects
- the capital expenditure that it is satisfied reasonably reflects the capital expenditure criteria, taking into account the capital expenditure factors, in the context of each contingent project as described in the regulatory proposal

²⁵ Rules, clause 6.6A.1.

²⁶ AEMC, *Rule Determination National Electricity Amendment (Cost pass through arrangements for Network Service Providers) Rule 2012*, 2 August 2012, p. 186

²⁷ Rules, clause 6.6A.1.

²⁸ Rules, clause 6.12.1(4A).

- the trigger events in relation to each contingent project (in which case the decision must clearly specify those trigger events)
- if the AER determines that such a proposed contingent project is not a contingent project for the reasons of the distribution determination, its reasons for that conclusion, having regard to the requirements of clause 6.6A.1(b).

In order to determine that a proposed contingent project is a contingent project for the purposes of a distribution determination, the AER must be satisfied that the proposed contingent project meets the following criteria:²⁹

- the proposed contingent project is reasonably required to be undertaken in order to achieve any of the capital expenditure objectives
- the proposed contingent capital expenditure:
 - is not otherwise provided for in the total of the forecast capital expenditure for the relevant regulatory control period which is accepted in accordance with clause 6.5.7(c) or substituted in accordance with clause 6.12.1(3)(ii) (as the case may be)
 - reasonably reflects the capital expenditure criteria in clause 6.5.7(c), taking into account the capital expenditure factors in clause 6.5.7(e)
 - exceeds either \$30 million or five per cent of the value of the annual revenue requirement for the distributor for the first year of the relevant regulatory control period,³⁰ whichever is the larger amount
- the proposed contingent project and the proposed contingent capital expenditure complies with the relevant requirements of any relevant regulatory information instrument
- the trigger events in relation to the proposed contingent project which are proposed by the distributor in its regulatory proposal are appropriate.

In determining whether a trigger event is appropriate, the Rules states that the AER must have regard to the need for a trigger event:³¹

- to be reasonably specific and capable of objective verification
- to be a condition or event, which, if it occurs, makes the undertaking of the proposed contingent project reasonably necessary in order to achieve any of the capital expenditure objectives
- to be a condition or event that generates increased costs that relate to a specific location rather than affecting the distribution network as a whole
- to be described in such terms that the occurrence of that event or condition is all that is required for the distribution determination to be amended under clause 6.6A.2
- to be an event or condition, the occurrence of which is probable during the regulatory control period but the inclusion of capital expenditure for which is not appropriate because:

²⁹ Rules, clause 6.6A.1(b).

³⁰ In its draft determination, the AER determined a total annual nominal revenue requirement of \$3245.8 million, with an annual nominal revenue requirement of \$611.8 million in 2021-22: AER, Draft Decision Powercor Distribution Determination 2021-21, September 2020, Attachment 1, p. 1-4. 5% of \$611.8 million is \$30.59 million. Our revised proposal includes an annual nominal revenue requirement of \$623.81 million in 2021-22. 5% of \$623.81 million is \$31.19 million. As 5% percent of our proposed annual nominal revenue requirement in 2021-22 is higher than both \$30 million and the amount proposed by the AER, we have proceeded with this amount.

³¹ Rules, clause 6.6A.1(c).

- it is not sufficiently certain that the event or condition will occur during the regulatory control period or if it may occur after that regulatory control period or at all; or
- the costs associated with the event or condition are not sufficiently certain.

Under clause 6.6A.2 of the Rules, a distributor may apply to the AER during a regulatory control period to amend a distribution determination that applies to that distributor where a trigger event for a contingent project in relation to that distribution determination, has occurred.

3.3 Original proposal

Our original proposal did not include any contingent projects.

3.4 Our response to the draft determination

The AER did not accept the estimate of capital expenditure included in our original proposal in respect of the new Ballarat West zone substation and substituted an estimate of \$25.6 million.³² While construction of the Ballarat West zone substation will be required in the next regulatory period, emerging uncertainties around the timing, costs and scope of the new zone substation mean that our revised proposal now includes a contingent project in respect of the construction of the Ballarat West zone substation, rather than capital expenditure.

In addition, since submitting our original proposal, the Victorian Auditor-General's Office's has published a report recommending that the Victorian Government accelerate the burying and insulating of remaining high-voltage bare-wire powerlines in the 33 highest bushfire risk areas across the state. As such, we are proposing a contingent project to ensure that, if such requirements come to fruition, we are able to recover our efficient costs of compliance.

3.4.1 Ballarat West zone substation

Our obligations

We have an obligation under the *Electricity Safety Act 1998* (Vic) (**ESA**) to install REFCLs at each of our zone substations listed in Schedule 2 to the *Electricity Safety (Bushfire Mitigation) Regulations 2013* (**Bushfire Mitigation Regulations**) by specified dates.³³ We are also required to include in our Bushfire Mitigation Plan (**BMP**) details of how we intend to ensure that each of our zone substations comply with the 'required capacity' under the Bushfire Mitigation Regulations.³⁴ We must comply with a BMP accepted by Energy Safe Victoria.³⁵

A zone substation will be a 'complying substation' where every polyphase electric line that originates from that substation has the 'required capacity'.³⁶ The 'required capacity' of Powercor's zone substations is defined as the ability to provide the following, in the event of a phase-to-ground fault on a polyphase electric line:³⁷

- to reduce the voltage on the faulted conductor in relation to the station earth when measured at the corresponding zone substation for high impedance faults to 250 volts within 2 seconds
- to reduce the voltage on the faulted conductor in relation to the station earth when measured at the corresponding zone substation for low impedance faults to:

³² AER, Draft Decision Powercor Distribution Determination 2021-21, September 2020, Attachment 5, pp. 5-60, 5-62.

³³ *Electricity Safety Act 1998* (Vic), section 120M.

³⁴ *Electricity Safety (Bushfire Mitigation) Regulations 2013*, regulation 7.

³⁵ *Electricity Safety Act 1998* (Vic), section 113B(2).

³⁶ *Electricity Safety Act 1998* (Vic), section 120L.

³⁷ *Electricity Safety (Bushfire Mitigation) Regulations 2013*, regulation 5, definition of 'required capacity'.

- 1,900 volts within 85 milliseconds
- 750 volts within 500 milliseconds
- 250 volts within 2 seconds
- during diagnostic tests for high impedance faults, to limit:
 - fault current to 0.5 amps or less
 - the thermal energy on the electric line to a maximum I^2t value of 0.10.³⁸

These requirements can only be met through the use of REFCL technology - specifically, by migrating our existing systems to a resonant earthed network through the installation of a Ground Fault Neutraliser (**GFN**). A GFN measures the shift in neutral voltage in response to an earth fault and injects additional compensation current to reduce the faulted phase voltage to near zero. This allows the GFN to reduce earth fault current levels at a fault site to near zero.

Our previous contingent project applications

We have submitted contingent project applications in respect of three tranches of REFCL installations. Each contingent project application included a scope of work and expenditure forecasts that enabled us to achieve the 'required capacity' specified in the Bushfire Mitigation Regulations by the required dates.

Ballarat is the largest inland city in Victoria, serving a population base of over 100,000 people. The region is supplied from AusNet Services' Ballarat terminal station (BATS), which supplies three Powercor zone substations at 66 kV/22 kV, being Ararat (ART), Ballarat North (**BAN**) and Ballarat South (**BAS**). BAN and BAS were included in our Tranche 2 works, for which the required compliance date is 1 May 2021.

Our Tranche 2 works were not scoped to maintain compliance beyond the required compliance date and into the next regulatory period. The Ballarat region is growing. As network capacitance continues to increase over time, BAN and BAS zone substations will become non-compliant unless upgrade works are undertaken.

Our original proposal

Our original regulatory proposal included capital expenditure of \$31.0 million (\$2021) to establish a new zone substation at Ballarat West (**BAW**). We identified that this capital expenditure was required to continue to comply with the ESA and Bushfire Mitigation Regulations as:

- At BAN, the total zone substation capacitive charging current will exceed the limit at each of the three buses by 2024, due to significant new underground cable growth as load increases. In addition, there are forecast load constraints on BAN 22kV feeders, as a result of developments on the western side of Ballarat, mainly the Ballarat West Employment Zone. The BAN zone substation does not have space for any additional 22kV feeders.
- At BAS, the substation capacitive charging current will exceed the Bus No.2 and Bus No.3 limit by 2024, as a result of significant new underground cable growth. There are also forecast load constraints at BAS, with its N-1 rating expected to be exceeded early in the 2021-26 regulatory period as a result of developments on the western side of Ballarat, mainly underground residential developments and commercial developments as part of the Ballarat West growth corridor.

³⁸ I^2t means a measure of the thermal energy associated with the current flow, where I is the current flow in amps and t is the duration of current flow in seconds.

The effect of BAS and BAN exceeding the relevant bus limits is that they would cease to be 'complying substations' within the meaning of the ESA and Bushfire Mitigation Regulations.

Our revised proposal

In our revised proposal, in light of uncertainties around the timing, nature and scope of the works, we are withdrawing the capital expenditure initially proposed in respect of the construction of the Ballarat West zone substation (which was in part accepted in the draft determination)³⁹ and are now proposing a contingent project.

We note that to the extent a contingent project is not included in the final determination, a capital expenditure allowance for the construction of the Ballarat West zone substation during the 2021-26 regulatory period would be required to enable us to comply with our regulatory obligations in respect of BAS and BAN.

Ballarat West zone substation

In order to ensure we continue to comply with the ESA and Bushfire Mitigation Regulations, for the reasons given in our original proposal, a new zone substation will be required at Ballarat West within the 2021-2026 period.

While we included proposed capital expenditure in our original proposal, there is now increased uncertainty in respect of the scope of the timing and scope of the project. In particular, community feedback has indicated that we need to work more closely with our key stakeholders, including the Ballarat Council, industry and residential customers to better understand their needs and expectations for the project, including in relation to undergrounding. As a result, we require more time to consult and analyse the solution that will best allow us to meet key stakeholders' requirements. We also need additional time to prepare a RIT-D in respect of the Ballarat West zone substation to ensure our proposed solution in respect of compliance at BAN and BAS represents the best available option.

Given that the exact timing, costs and scope of the new zone substation are now uncertain, we consider that the required capital expenditure is the proper subject of a contingent project, rather than forming part of our capital expenditure forecast in our revised proposal. However, should the AER determine not to accept the proposed contingent project, the capital expenditure allowance for the next regulatory period will need to include an allowance for BAW. In order to reasonably reflect the capital expenditure objectives, this allowance will need to take into account the considerations set out in the Bushfire mitigation chapter of this revised proposal, as well as the additional capital expenditure required to deliver on customer expectations in respect of undergrounding detailed below.

The event we propose is contained in the box below.

³⁹ AER, Draft Decision Powercor Distribution Determination 2021-21, September 2020, Attachment 5, pp. 5-60-5-62

Table 8 Ballarat West zone substation

Proposed contingent project	Proposed contingent capital expenditure (\$2021)	Proposed contingent project trigger
Ballarat West zone substation	52 million	<p>A Ballarat West zone substation trigger event occurs if:</p> <ol style="list-style-type: none"> 1. Powercor applies or reapplies a regulatory investment test for distribution to a project which has the objective of ensuring that the Ballarat North zone substation and/or Ballarat South zone substation will continue to be 'complying substations' within the meaning of the <i>Electricity Safety Act 1998</i> (Vic); and 2. Either: <ol style="list-style-type: none"> a) no notice of dispute in relation to Powercor's conclusions in the final project assessment report is given to the AER within the time frame provided for in the National Electricity Rules; or b) the AER rejects all notices of dispute in relation to Powercor's conclusions in the final project assessment report or makes a determination, based on the grounds of dispute, that Powercor will not be required to amend the final project assessment report; or c) Powercor complies with a determination by the AER directing Powercor to amend the final project assessment report, <p>and</p> 3. Powercor has committed internally to proceed with the project subject to the AER amending the distribution determination for the 2021-2026 regulatory control period in accordance with the National Electricity Rules.

Source: Powercor

Proposed contingent capital expenditure

We are proposing \$52.0 million (\$2021) of contingent capital expenditure in respect of the Ballarat West zone substation. However, given uncertainties around the timing, nature and scope of the works, this estimate is indicative only and we will revisit our forecast once we have had a further opportunity to engage with our customers and the local community, and have applied the RIT-D.

Our original proposal included \$31 million of capital expenditure.⁴⁰ The draft determination rejected some of these costs and allowed \$25.6 million.⁴¹ For the reasons given in our Bushfire mitigation chapter, we disagree with the reduction to the capital expenditure allowance in the draft determination, and consider that \$30.3 million would be required to achieve the capital expenditure objectives, based on the initial scope.⁴²

Further, and in any event, in addition to the \$30.3 million, we now expect to incur around \$13.0 million more sub-transmission line expenditure than forecast in our original proposal. This is primarily due to community expectations in respect of undergrounding lines around sites of local significance. Undergrounding requires longer lengths of sub-transmission line and the nature of the works results in higher costs. We plan to further

⁴⁰ PAL MOD 6.10 - REFCL cost model - Jan2020 - public.

⁴¹ AER, Draft Decision Powercor Distribution Determination 2021-21, September 2020, Attachment 5, pp. 5-60, 5-62.

⁴² For further information, please see the Bushfire mitigation chapter of this revised proposal.

engage with our customers and the local community to understand how we can best balance community requirements against the additional costs resulting from the works.

Our revised estimate also includes additional contingent capital expenditure in respect of works at the Ballarat South zone substation. These works are required to extend the control room to include new sub-transmission loop from BAS to BAW. A summary of Powercor's anticipated expenditure in respect of this project is contained in the table below. We have arrived at our estimate of these costs on the basis of our experience in similar projects and current material and labour rates.

Table 9 Expenditure forecast for Ballarat West (\$ million, 2021)

Description	Investment (\$2021)
Ballarat West zone substation	52 million

Source: Powercor

The AER should accept the Ballarat Zone Substation contingent project

In respect of the requirement in clause 6.6A.1(b)(1) of the Rules, the proposed contingent project will be required to ensure that we continue to comply with the ESA and Bushfire Mitigation Regulations. These are regulatory obligations or requirements associated with the provision of standard control services, as they represent a distribution system safety duty, being a requirement under the ESA, the ESA being an act relating to the safe distribution of electricity in Victoria.⁴³

As we have withdrawn the forecast capital expenditure provided for in the draft determination in respect of the Ballarat West zone substation, the acceptance of this proposed contingent project is reasonably required in order to allow us a reasonable opportunity to recover our efficient costs in complying with a regulatory obligation and achieve the capital expenditure objective of complying with all applicable regulatory obligations or requirements associated with the provision of standard control services.⁴⁴

The proposed contingent project also meets the criteria set out in clause 6.6A.1(b)(2) of the Rules as the proposed contingent capital expenditure:

- is not otherwise provided for in the total of the forecast capital expenditure for the relevant regulatory control period
- reasonably reflects the capital expenditure criteria in clause 6.5.7(c), taking into account the capital expenditure factors in clause 6.5.7(e)
- exceeds \$31.19 million, being five percent of the value of our proposed annual revenue requirement for the first year of the relevant regulatory control period⁴⁵
- there are no relevant regulatory information instruments.

The trigger is appropriate given it reflects the current distribution investment framework and is focussed on the RIT-D as the mechanism to provide a transparent and thorough assessment of investment options and safeguard

⁴³ Law, section 2(1) definition of 'distribution system safety duty' and section 2D definition of 'regulatory obligation or requirement'.

⁴⁴ Law, section 7(A); Rules, clause 6.5.7(a)(2).

⁴⁵ As 5% percent of our proposed annual nominal revenue requirement in 2021-22 is higher than both \$30 million and the amount proposed by the AER, we have proceeded with this amount.

the interests of consumers funding those investment. The proposed trigger event is also appropriate having regard to the mandatory considerations set out in the Rules as follows:⁴⁶

- the trigger event is specific and capable of objective verification
- it is an event, which, if it occurs (i.e. if works are required to ensure the BAS and BAN zone substations continue to have the required capacity), means that the proposed contingent project will be reasonably necessary in order to comply with all applicable regulatory obligations or requirements associated with the provision of standard control services
- the compliance activities contemplated relate to a specific location, being the proposed site for the Ballarat West zone substation to ensure compliance with the ESA and Bushfire Mitigation Regulations at the BAS and BAN zone substations, rather than affecting the distribution network as a whole
- the trigger event is described in such terms that the occurrence of that event or condition is all that is required for the distribution determination to be amended under clause 6.6A.2
- given that, BAN and BAS are both likely to cease being 'complying substations' within the forthcoming regulatory period, the occurrence of the proposed event during the regulatory control period is probable, however, given the need to further consult with our customers and key stakeholders, the timing of the event and the costs associated with it are not sufficiently certain to include in our capital expenditure forecast.

Finally, given the trigger event is both specific to Powercor, and likely to occur, we think it is more suited to the contingent project mechanism, rather than a nominated pass through event.⁴⁷

3.4.2 Conductor replacement event

There is around 1,359 kilometres of high-voltage bare-wire overhead powerline within the 33 highest bushfire risk areas of our network (known as electric line construction areas (**ELCAs**)).

The Victorian Auditor General recently conducted an independent assessment of whether responsible agencies are working together effectively to reduce Victoria's bushfire risk. That report recommended the Department of Environment, Land, Water and Planning (**DELWP**) investigate incentives and advise government on options to accelerate burying and insulating the remaining high-voltage bare-wire powerlines within ELCAs.⁴⁸ DELWP has accepted that recommendation.⁴⁹

Our original proposal

The conductor replacement event was not included in our original proposal, as the possible change in our obligations had not yet been announced and could not have been foreseen.

Our revised proposal

Given the risks posed by bushfire and warranted community concern, we expect the DELWP investigation and subsequent advice to government, and the government's response to that advice, may give rise to new obligations that mean we are required to incur expenditure associated with burying and insulating high-voltage bare-wire powerlines, that is not reflected in our regulatory proposal.

⁴⁶ Rules, clause 6.6A.1(c).

⁴⁷ AEMC, *Rule Determination National Electricity Amendment (Cost pass through arrangements for Network Service Providers) Rule 2012*, 2 August 2012, p. 186

⁴⁸ DELWP, *Electric Line Declared Energy Maps*, 9 June 2017 <<https://www.energy.vic.gov.au/safety-and-emergencies/powerline-bushfire-safety-program/electrical-safety-bushfire-mitigation-further-amendment-regulations-2016/electric-line-declared-energy-maps>>.

⁴⁹ Victorian Auditor-General's Office, *Reducing Bushfire Risks* (Independent assurance report to Parliament 2020–21) 4 October 2020, Recommendation 16.

The Bushfire Mitigation Regulations currently require our BMP to include details of the preventative strategies and programs by which we will ensure that within an ELCA, each electric line with a nominal voltage of between 1 kV and 22 kV that is constructed, or is wholly or substantially replaced, is a covered or underground electric line.⁵⁰ In ELCAs, where four or more consecutive spans of an electric line are replaced, those spans must be replaced with covered or underground conductor. Any new works to be undertaken in ELCAs, including augmentation or connections, must also comply with the higher standards of construction. We expect that any further change to our obligations would come about via an amendment to the Bushfire Mitigation Regulations, such that we would be required to proactively replace conductor within ELCA's (rather than only replace new conductor with covered or underground conductor).

However, as the details of any change in our obligations has not yet been announced, it is not currently possible to know whether this is the form any change to our obligations would take, or predict with any certainty the scope of the works that will be required in the next regulatory period to comply with any new requirement. As such, we consider that the capital expenditure is the proper subject of a contingent project, rather than forming part of our capital expenditure forecast in our revised proposal.

In addition, the means by which we will be required to increase our expenditure on proactively undergrounding and insulating bare-wire powerlines is currently unclear. While the expenditure may potentially be recovered through the cost pass through provisions, there is no certainty that this will be the case and we consider it preferable to have one contingent project for new or changed obligations or requirements in relation to high-voltage bare-wire powerlines in ELCAs. Further, given the potentially significant capital expenditure involved, we consider it more appropriate to recover any costs through the contingent project mechanism.

Our proposed trigger event definition is in the table below.

⁵⁰ Electricity Safety (Bushfire Mitigation) Amendment Regulations 2016, Reg. 7(1)(hc).

Table 10 Expenditure forecasts for the preferred option (\$ million, 2021)

Proposed contingent project	Proposed contingent capital expenditure (\$2021)	Proposed trigger event
Conductor replacement	\$112 million	<p>In circumstances where one or more new or changed regulatory obligations or requirements (within the meaning given to that term by section 2D of the National Electricity Law) ("relevant regulatory obligations or requirements") in respect of high-voltage bare-wire powerlines in electric line construction areas is imposed on Powercor during the 2021-2026 regulatory control period, the trigger event in respect of the conductor replacement contingent project occurs when:</p> <ol style="list-style-type: none"> 1. Powercor applies or reapplies a regulatory investment test for distribution to a project with the object of achieving compliance with the relevant regulatory obligations or requirements; and 2. Either: <ol style="list-style-type: none"> a) no notice of dispute in relation to Powercor's conclusions in the final project assessment report is given to the AER within the time frame provided for in the National Electricity Rules; or b) the AER rejects all notices of dispute in relation to Powercor's conclusions in the final project assessment report or makes a determination, based on the grounds of dispute, that Powercor will not be required to amend the final project assessment report; or c) Powercor complies with a determination by the AER directing Powercor to amend the final project assessment report. 3. Powercor has committed internally to proceed with the project subject to the AER amending the distribution determination for the 2021-2026 regulatory control period in accordance with the National Electricity Rules.

Source: Powercor

Proposed contingent capital expenditure

The bare overhead lines within our network's ELCA's comprise:

- 416 kilometres of single-wire earth return (**SWER**) conductor; and
- 2,372km (943 route kilometres) of multiphase conductor,

for a total of 2,788 kilometres (1359 route kilometres) of conductor.

Replacing all of this conductor would require capital expenditure of \$212 million (\$2021).⁵¹ In forecasting the required capital expenditure, we have assumed that:

- SWER conductor will be replaced with Amokabel covered conductor at a cost of \$72,000 per route kilometre.⁵²

⁵¹ This figure is comprised of \$30 million in respect of all SWER overhead conduct and \$182 million in respect of multiphase conduct

⁵² This solution has not yet been formally endorsed by ESV at this stage.

- Multiphase conductor will be replaced with Hendrix covered conductor at a cost of \$193,000 per route kilometre.

The proposed capital expenditure is further set out in the table below. We have arrived at these figures on the basis of our experience in similar projects to date.

Table 11 Conductor replacement contingent capital expenditure

Description	Investment (\$2021)
Replacement of 416 kilometres of SWER conductor with Amokabel covered conductor	30 million
Bunding compliance program	182 million
Total	212 million

Source: Powercor

The AER should accept the conductor replacement contingent project

The Victorian Auditor-General's Office's report suggests that a new or changed regulatory obligation in respect of bare overhead lines may be imposed upon us in the next regulatory control period. As we have not otherwise included forecast capital expenditure in respect of the project for the 2021-2026 regulatory control period, the acceptance of this proposed contingent project is reasonably required in order for Powercor to achieve the capital expenditure objective of complying with all applicable regulatory obligations or requirements associated with the provision of standard control services.⁵³

The proposed contingent project also meets the criteria set out in clause 6.6A.1(b)(2) of the Rules as the proposed contingent capital expenditure:

- is not otherwise provided for in the total of the forecast capital expenditure for the relevant regulatory control period
- reasonably reflects the capital expenditure criteria in clause 6.5.7(c), taking into account the capital expenditure factors in clause 6.5.7(e)
- exceeds \$31.19 million , being five per cent of the value of Powercor's proposed annual revenue requirement for the first year of the relevant regulatory control period⁵⁴
- there are otherwise no relevant regulatory information instruments.

In addition, the proposed trigger event is appropriate given it reflects the current distribution investment framework and is focussed on the RIT-D as the mechanism to provide a transparent and thorough assessment of investment options and safeguard the interests of consumers funding those investment. The proposed trigger event is also appropriate having regard to the mandatory considerations set out in the Rules as follows:⁵⁵

- the trigger event is specific and capable of objective verification

⁵³ Rules, clause 6.5.7(a)(2).

⁵⁴ As 5% percent of our proposed annual nominal revenue requirement in 2021-22 is higher than both \$30 million and the amount proposed by the AER, we have proceeded with this amount.

⁵⁵ Rules, clause 6.6A.1(c).

- it is an event, which, if it occurs, means that the proposed contingent project will be reasonably necessary in order to comply with all applicable regulatory obligations or requirements associated with the provision of standard control services and maintaining the safety of the distribution network
- the compliance activities contemplated will relate to works on high-voltage bare-wire powerlines in ECLAs, rather than the distribution network as a whole
- it is described in such terms that the occurrence of that event or condition is all that is required for the distribution determination to be amended under clause 6.6A.2
- given the Victorian Auditor-General Office's recommendation, and DELWP's acceptance of that recommendation, the occurrence of the proposed event during the regulatory control period is probable, but, as the report was only just introduced, the timing of, and likely costs associated with, the project are not yet known with sufficient certainty to include in the project in our proposed capital expenditure allowance.

Finally, given the trigger event is both specific to Powercor, and likely to occur, we think it is more suited to the contingent project mechanism, rather than a nominated pass through event.⁵⁶

⁵⁶ AEMC, *Rule Determination National Electricity Amendment (Cost pass through arrangements for Network Service Providers) Rule 2012*, 2 August 2012, p. 186