

# Draft Decision

**Multinet Gas Networks**

**Access Arrangement 2023 to 2028**

(1 July 2023 to 30 June 2028)

**Attachment 5**  
**Capital expenditure**

December 2022

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## Note

This attachment forms part of the AER’s draft decision on the access arrangement that will apply to Multinet Gas Networks (MGN) for the 2023–28 access arrangement period. It should be read with all other parts of the draft decision.

The draft decision includes the following documents:

Overview

Attachment 1 – Services covered by the access arrangement

Attachment 2 – Capital base

Attachment 3 – Rate of return

Attachment 4 – Regulatory depreciation

Attachment 5 – Capital expenditure

Attachment 6 – Operating expenditure

Attachment 7 – Corporate income tax

Attachment 8 – Efficiency carryover mechanism

Attachment 9 – Reference tariff setting

Attachment 10 – Reference tariff variation mechanism

Attachment 11 – Non-tariff components

Attachment 12 – Demand

Attachment 13 – Capital expenditure sharing scheme

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## 5 Capital expenditure

Capital expenditure (capex) refers to the capital costs and expenditure incurred in the provision of pipeline services.<sup>1</sup> This investment mostly relates to assets with long lives and these costs are recovered over several access arrangement periods.

In this attachment, we outline our assessment of MGN's capex proposal. Our draft decision consists of two parts:

- whether capex spent in the six years before the 2023-28 access arrangement period should be added to the capital base<sup>2</sup> and
- whether MGN's forecast of capex for the 2023-28 access arrangement period meets the conforming capex criteria in the National Gas Rules (NGR).<sup>3</sup>

### 5.1 Draft decision

#### 5.1.1 Conforming capex for the 2017 and 2018–21 period, estimates for 2022 and January to June 2023

We approve the actual total net capex for MGN for the years 2017 and 2018–2021 as conforming capex, made up of the following:

- 2017 capex – at the time of our last decision, actual expenditure for 2017 was not known, and an estimate was included in the capital base. We now have actual expenditure for that year and have updated the capital base accordingly<sup>4</sup>
- 2018–21 capex – actual expenditure is available for these years, and we have assessed whether this can be included in the capital base<sup>5</sup>
- 2022 and the six-month extension period – actual capex is not available currently. We have included an estimate in the capital base. We will update this in the next access arrangement decision, when actual capex is available.<sup>6</sup> We will assess whether MGN's actual capex for 2022 and the six-month extension period is conforming capex under the NGR in the subsequent (2028–32) access arrangement review and adjust for any differences between actual and estimated capex.<sup>7</sup>

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<sup>1</sup> NGR, r. 69.

<sup>2</sup> NGR, r. 77 sets out the process for determining the opening capital base.

<sup>3</sup> These criteria are set out in NGR, r. 79.

<sup>4</sup> These criteria are set out in NGR, r. 79.

<sup>5</sup> We assess whether actual capital expenditure is conforming capital expenditure under the capital expenditure criteria in NGR, r. 79

<sup>6</sup> This is consistent with our obligations under NGR, rr. 77(2)(b), 79.

<sup>7</sup> This is consistent with our obligations under NGR, rr. 77(2)(b), 79.

### **5.1.2 Conforming capex for the 2023–28 period**

We accept MGN's capex forecast of \$668.7 million (\$2022–23) total net capex for the 2023–28 access arrangement period as conforming capex under the NGR.<sup>8</sup>

We assessed MGN's forecast capex against our alternative estimate of efficient capex, considering the available evidence, engineering advice from our consultants and submissions from stakeholders.

Overall, we found that most aspects of MGN's proposal were likely to be conforming capex. We determined an alternative forecast of \$658.1 million (\$11.6 million less than MGN's proposal) because we did not accept proposed expenditure on hydrogen readiness (\$9 million) and a cyber security uplift in information technology (\$2.6 million). We have accepted that MGN's forecast capex of \$668.7 million is prudent and efficient.

## **5.2 MGN's proposal**

### **5.2.1 Actual and estimated capex in the 2018–22 period**

MGN's actual and estimated capex for the current access arrangement is \$468 million, compared with the AER's final decision estimate of \$439 million. MGN's connections capex was higher than forecast during the period,<sup>9</sup> leading to the overspend.

### **5.2.2 Forecast capex in the 2023–28 period**

MGN proposed forecast net capex of \$668.7 million (\$2022–23) for the 2023–28 access arrangement period is \$200.3 million (43%) higher than its actual and estimated net capex for the 2018–22 period.<sup>10</sup>

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<sup>8</sup> The criteria for conforming capital expenditure are set out in NGR, r. 79.

<sup>9</sup> AER, *Final Decision Multinet Gas access arrangement 2018-22 – Overview*, November 2017, p. 91.

<sup>10</sup> MGN's capex for both 2019-20 and 2020-21 are estimates only.

Table 5.1 sets out MGN’s proposed capex by category over the forecast period.

**Table 5.1 MGN’s proposed capex by category over the 2023–28 access arrangement period (\$million, 2022–23)**

Category	2023-24	2024-25	2025-26	2026-27	2027-28	Total
Mains replacement	75.5	85.1	78.1	82.0	87.6	408.3
Meter replacement	2.8	3.6	4.0	5.5	6.5	22.4
Augmentation	0.3	0.3	0.0	0.2	0.7	1.5
Telemetry	1.2	0.9	0.9	0.8	0.8	4.5
IT	17.8	28.4	12.1	4.9	8.2	71.4
Connection assets	23.3	20.7	18.6	16.7	14.4	93.7
Other distribution assets	5.9	9.5	4.9	8.7	2.7	31.8
Escalation	0.2	0.9	1.1	1.4	1.8	5.3
Capitalised network overheads	5.9	6.3	5.8	5.8	5.9	29.7
<b>TOTAL</b>	<b>132.9</b>	<b>155.7</b>	<b>125.4</b>	<b>126.1</b>	<b>128.5</b>	<b>668.7</b>
Customer contributions	3.1	3.0	3.0	3.0	2.9	15.0
<b>GROSS TOTAL</b>	<b>136.1</b>	<b>158.7</b>	<b>128.4</b>	<b>129.0</b>	<b>131.4</b>	<b>683.7</b>

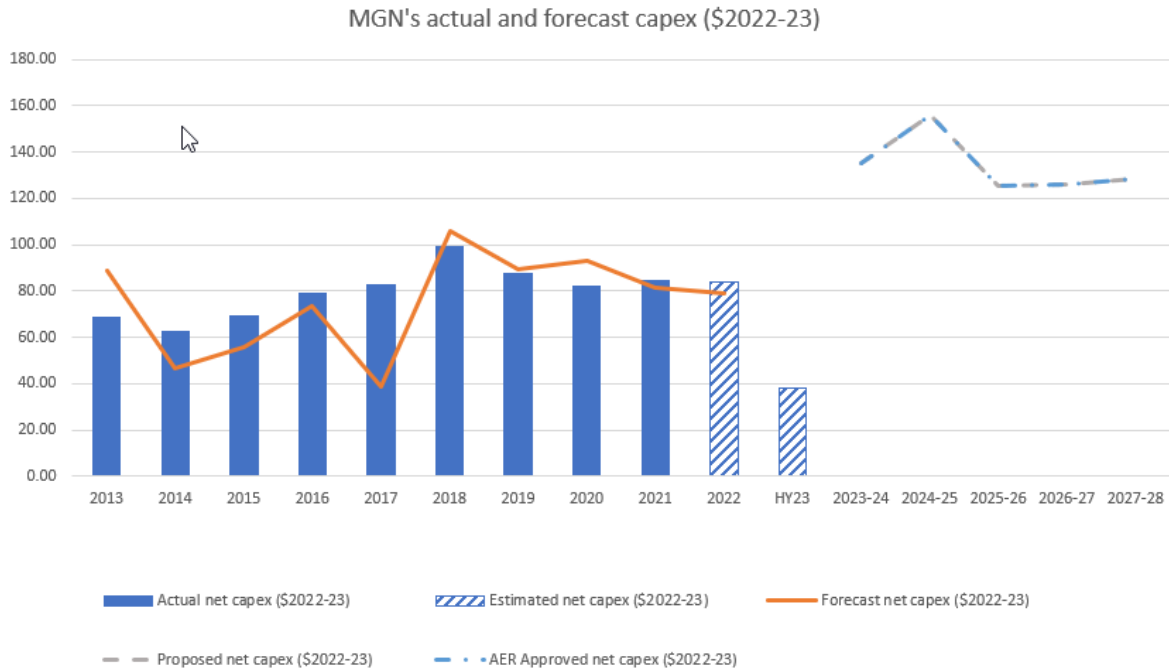
Note: Totals may not sum due to rounding.

Source: MGN, *Response to information request IR021*, Received 19 October 2020. AER analysis.

The major components of forecast gross total capex over the period are mains replacement (61%), connection assets (14%) and information technology (11%).

Figure 5.1 compares MGN’s capex from 2015 to 2028, and the forecasts accepted by us in our 2016–21 decision and this draft decision. The significant step up in forecast capital expenditure in the upcoming period is driven by an increase in MGN’s capex on mains replacement. This is explained in detail in the section below on mains replacement. MGN’s other capex categories are more in line with historical expenditure.

**Figure 5.1 AER’s draft decision compared to MGN’s past and proposed capex (\$million, 2022–23)**



Source: AER analysis.

Note: Significant step up in forecast due to MGN mains replacement program.

### 5.3 Assessment approach

We must make two decisions on MGN’s capex. First, we assess past capex to determine whether it is conforming capex that can be added to the opening capital base.<sup>11</sup> Second, we assess MGN’s forecast of required capex for the 2023–28 period to determine whether it meets the new capex criteria set out in the NGR.<sup>12</sup>

The following sections set out our approach and the tools and techniques we employ in forming these decisions.

#### 5.3.1 Capex in the 2018–22 period

We reviewed MGN’s submission and supporting material to assess its actual and estimated capex for the 2018–22 access arrangement period. Where capex was higher than forecast in our final decision, we scrutinised MGN’s reasons for the overspend. We also had regard to the presence of the capital expenditure sharing scheme (CESS), and the incentive this

<sup>11</sup> Under NGR, r. 77(2)(b), we add capital expenditure to the capital base only if it is conforming capital expenditure.

<sup>12</sup> NGR, r. 79.



provides to deliver efficient capex.<sup>13</sup> We used this information to identify whether capex over the 2018–22 period was conforming capex.

### 5.3.2 Capex in the 2023–28 period

Our draft decision is made on total forecast capex in accordance with the new capex criteria in the NGR.<sup>14</sup>

To make a decision, we construct an alternative estimate of efficient capex, and compare it to MGN’s proposal. If our alternative estimate is not materially different to MGN’s proposal, we will accept MGN’s proposal. On the other hand, if there is a material difference at the total capex level, we will not accept MGN’s forecast, and substitute it with our alternative estimate.

We have assessed the key drivers of forecast capex to consider whether MGN’s proposed capex complies with the new capex criteria. In doing so, we relied on the following information:

- MGN’s access arrangement submission and access arrangement information, which outlines its capex program and the main drivers of those programs
- business cases that detail the expenditure requirements for specific projects
- MGN’s Regulatory Information Notice (RIN) responses
- MGN’s capex forecast model
- responses to information requests
- engineering advice we commissioned from Zincara on selected projects
- submissions from interested parties.

Our assessment was particularly focussed on the materiality of the capex categories, whether the expenditure was significantly higher than historical expenditure, whether the capex related to a new type of asset, whether there was significant precedent value in our decision or where stakeholders have raised significant issues. We also take into consideration the interrelationships between the capex forecast and other constituent components of our decision such that our decision is likely to contribute to the achievement of the National Gas Objective (NGO).<sup>15</sup>

Table 5.2 compares MGN’s capex at a total and component level from the current access arrangement period with the 2023–28 access arrangement period (including % of forecast total capex).

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<sup>13</sup> The capital expenditure sharing scheme (CESS) provides an incentive for a service provider to realise savings on its capex program by rewarding those service providers that spend less capex than forecast and penalising those that spend more than forecast. Further information can be found in the CESS section at attachment 13.

<sup>14</sup> NGR, r. 79(1).

<sup>15</sup> We are required to do this under NGL, s. 28(1).

**Table 5.2 MGN capital expenditure proposal versus current AA actuals/estimates**

Capex (June \$2023, millions)	2018-22	2023-28	Difference (\$m)
Mains replacement	206.7	408.3 (61.1%)	201.6
Connection assets	128.1	93.7 (14.0%)	-34.4
IT	47.5	71.4 (10.7%)	23.9
Meter replacement	15.9	22.4 (3.3%)	6.5
Augmentation	18.0	1.5 (0.2%)	-16.5
Telemetry	5.0	4.5 (0.7%)	-0.5
Other assets	19.6	31.8 (4.8%)	12.2
Escalation	0.0	5.3 (0.8%)	5.3
Overheads	27.6	29.7 (4.4%)	2.1
<b>TOTAL</b>	<b>468.4</b>	<b>668.7</b>	<b>200.3</b>
Customer contributions	6.7	15.0 (2.2%)	8.3
<b>GROSS TOTAL</b>	<b>475.1</b>	<b>683.7</b>	<b>208.6</b>

Source: MGN submitted updated forecast capex values which reduced total net capex by \$0.7 million (\$2022–23). MGN, Response to AER Information request #020, 25 October 2022. Totals may not sum due to rounding

### 5.3.3 Interrelationships

In assessing MGN's total forecast capex, we also took into account other components of its access arrangement proposal, including:

- possible trade-offs between capex and operating expenditure (opex)
- any differences between capitalisation policies applied in the 2018–22 and 2023–28 periods
- the growth in the price of labour for opex and capex
- demand forecasts, particularly relating to forecast new gas connections.

## 5.4 Reasons for draft decision on 2018–22 period capex

### 5.4.1 Conforming capex for 2018–22

MGN's actual and estimated capex for the current access arrangement is \$468.4 million, compared with the AER's final decision estimate of \$487.5 million. The difference was driven by lower than forecast mains replacement volumes.

We reviewed MGN's submission and supporting material to assess its proposed capex for the 2018–22 access arrangement period. Where capex was higher than accepted in our 2018–22 final decision, we scrutinised MGN's reasons for the overspend. We also had regard to the presence of the CESS, and the incentive this provides to deliver efficient

capex.<sup>16</sup> We used this information to identify whether capex over the 2018–22 period was conforming capex.

The framework allows regulated businesses to reprioritise capex to achieve prudent and efficient outcomes, such as response to COVID and safety priorities. We accept MGN's deferral of part of its mains replacement program. We note the overall underspend is modest.

## 5.5 Reasons for draft decision on 2023–28 period capex

As noted in section 5.3, we have assessed MGN's proposed total capex by constructing an alternative estimate of efficient capex. To do this we have assessed the prudence and efficiency of particularly important parts of MGN's capital expenditure. In particular, our alternative estimate has focussed on four categories of capex that represent around 90% of forecast capex, being mains replacement, connections, IT and other assets (including hydrogen readiness).

**Table 5.3 MGN main drivers of capex**

Category	% of total net capex	Increase/decrease over current period estimate (\$million, 2022-23)
Mains replacement	61.1%	201.6
Connection Assets	14%	-34.4
IT	10.7%	23.9
Other assets including hydrogen	4.8%	12.2

Source: MGN-IR020-Attachment 9.3A GSR Response Capex Forecast Model 25102022 Update, October 2022

### 5.5.1 Mains replacement

Operators of gas networks replace gas mains when they have significantly deteriorated and are no longer able to safely operate or are at risk of reaching this level of deterioration in the near future.<sup>17</sup>

#### 5.5.1.1 MGN's proposal

In Victoria, a program to replace older bare steel and cast iron pipes with plastic equivalents has been ongoing for more than a decade, and is viewed as a safety priority by gas networks and the safety regulator, Energy Safe Victoria (ESV). MGN's proposed mains replacement capex is a continuation of this program. The program consists of proactive replacement (e.g. where a leaking pipe has been identified) and reactive replacement programs (e.g. a pipe is at risk of leaking due to age or material degradation).

MGN proposes to complete 700 kilometres of mains in the upcoming access arrangement period, at a cost of \$408.3 million. MGN states that this is the single most important activity it

<sup>16</sup> The capital expenditure sharing scheme (CESS) provides an incentive for a service provider to realise savings on its capex program by rewarding those service providers that spend less capex than forecast and penalising those that spend more than forecast. Further information can be found in the CESS section at attachment 13.

<sup>17</sup> Mains are defined as low pressure (1.4-7 kpa), medium pressure (15-210 kpa), and high pressure (140-515 kpa) pipes that distribute gas from the transmission system to customers.

undertakes to ensure public safety.<sup>18</sup> MGN replaced 600 kilometres of mains from 2018 to 2022.<sup>19</sup>

MGN provided additional information to us in response to information requests and we met with them to discuss and clarify information requests.<sup>20</sup>

### 5.5.1.2 Draft decision

Our draft decision is to accept MGN’s forecast for mains replacement capex over the 2023–28 access arrangement period of \$408.3 million (\$2022–23, direct cost). We accept that MGN’s mains replacement program is necessary to maintain and improve the safety of services and to maintain the integrity of services.<sup>21</sup>

### 5.5.1.3 Submissions

Generally, stakeholder submissions were not supportive of the proposed expenditure:

- Friends of the Earth did not support MGN’s proposal for mains replacement.
- Energy Users Association of Australian (EUAA) submitted that ESV should provide some formal advice on the safety requirements for mains replacement, and suggested the AER engage with ESV on this matter.<sup>22</sup>
- The Brotherhood of Saint Laurence submitted that the Distribution Mains Strategy document does not clarify ESV’s opinion on the safety imperative of the proposed mains program.
- EnergyAustralia questioned the MGN’s asset deterioration case and failure rates. It suggested that the AER should seek explicit confirmation from ESV that the works are prudent and offset by safety benefits to the community.<sup>23</sup>

### 5.5.1.4 Our assessment

As noted earlier, MGN’s mains replacement capex is a continuation of a state-wide program to replace aging metal gas mains with modern plastic equivalents. MGN has proposed capex to meet Australian Standards, its gas safety case and jurisdictional safety obligations.<sup>24</sup> Consequently, we have focussed on whether MGN’s proposed capex is required to meet this obligation, and whether the cost of the program is efficient.

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<sup>18</sup> MGN: *Vic Final Plan*, July 2022, p.97.

<sup>19</sup> MGN: *Vic Final Plan 2023 - 24 July 2022 – Public*. p. 22.

<sup>20</sup> MGN, Response to information requests, IR004, IR009 and IR020.

<sup>21</sup> This therefore constitutes conforming capex pursuant to NGR, rr. 79(1)(b), 79(2)(c)(i)(ii).

<sup>22</sup> EUAA, *Submission on Victorian Gas Access Arrangements*, 30 September 2022, p. 7.

<sup>23</sup> Energy Australia: *Submission to VIC GAAR*, Sep 2022

<sup>24</sup> Gas Safety Act 1997 (Vic); Occupational Health and Safety Act 2004; Workplace Health and Safety Act 2012; NGL; NGR; Gas Distribution System Code Ver. 15.0; Pipelines Act 2005; Pipelines Regulations 2017; Gas Safety (Safety Case) Regulations 2018; MGN Gas Safety Case; AS/NZS ISO 31000 Risk Management – Principles and Guidelines; AS/NZS 4645 – Gas Distribution Network Management; AS/NZS4645.2 - Installation and maintenance of steel pipe systems for gas; AS/NZS 2885 Series – Pipelines Gas and liquid Petroleum: EP-PL-7600 – Multinet Gas Engineering Standard - Pressure Classifications and Operating Pressure Ranges.

Our assessment is informed by our analysis of MGN’s mains replacement plan, independent advice from engineering consultant, Zincara<sup>25</sup>, advice from the safety regulator, engagement with ESV, and submissions from stakeholders.

#### **5.5.1.4.1 MGN’s replacement plan and its safety obligations**

MGN submits that, by replacing 704 kilometres of cast iron (CI) and unprotected steel (UPS) mains over the next five years, it is taking reasonable measures to remove the safety risk of these assets from the network at an efficient and achievable rate.<sup>26</sup> MGN plans to remove all low-pressure CI and USP mains from its network by 2033. MGN notes that it regularly engages with ESV on its progress against existing plans and on the development of the ongoing replacement program.<sup>27 28</sup>

MGN considers that its CI and UPS mains are high safety risk assets, and need to be replaced as soon as practicable, in line with Australian Standards<sup>29</sup> and its safety obligations to ESV.<sup>30</sup> The main risk event associated with these mains is a loss of containment, leading to build up of gas in sufficient volumes to cause an explosion. MGN submits that its mains replacement planning is based on an assessment of risk, performance and condition/integrity.<sup>31</sup>

We engaged with ESV on the mains replacement program.<sup>32</sup> The following describes the Gas Safety Regulations 2018.<sup>33</sup>

The regulations require gas companies – including natural gas transmission and distribution companies, gas retailers and LP Gas businesses – to submit a safety case to ESV and to comply with an accepted safety case. The Gas Safety Act 1997 also allows submission of safety cases for complex gas installations on a voluntary basis and permits complex gas installation operators and Type B gas appliance manufacturers to seek exemption from prescriptive compliance requirements.

The primary objective of the Regulations is to prescribe content requirements for safety cases and safety management systems, standards of gas quality and requirements for testing of gas conveyed through pipelines, and requirements for reporting of gas incidents to ESV.

The distributor must comply with the provisional acceptance of its gas safety case, Safety Management Plan (SMP) and Safety Management System (SMSy). A gas company may not operate an energy network without having a safety case accepted by the ESV. Gas companies must review and resubmit Safety Cases to ESV for acceptance every five

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<sup>25</sup> Zincara, *MGN AA Review*, November 2022

<sup>26</sup> MGN, *Distribution Mains and Services Strategy: Appendix A.1.1*, July 2022.

<sup>27</sup> MGN, *Distribution Mains and Services Strategy: section 5.5.1*, July 2022.

<sup>28</sup> AER, IR004 and IR009 responses, dated 09/08/2022 and 09/09/2022.

<sup>29</sup> Australian Standard 4645 – This standard applies to the management of gas distribution networks in Australia and prescribes a risk management approach in accordance with ISO 31000.

<sup>30</sup> Its safety case accepted by ESV under the Gas Safety Act (1997) and Gas Safety (Safety Case) Regulations 2018

<sup>31</sup> NGR, r. 79 (2) (i),(ii),(iii)

<sup>32</sup> Meeting ESV AER 16 September 2022

<sup>33</sup> ESV, *Gas Infrastructure Safety Cases*, <https://esv.vic.gov.au/technical-information/gas-infrastructure-and-pipelines/gas-infrastructure-safety-cases/>

years.<sup>34</sup> The AER's role is to examine whether the practical work to meet the asset management plan, in accordance with its gas safety case and capex is prudent and efficient. We have engaged Zincara to examine MGN's approach and proposed unit rates. Zincara has advised that MGN's program to achieve its asset management plan and strategy is prudent and efficient as discussed in the below sections.<sup>35</sup>

#### 5.5.1.4.2 Has MGN's mains replacement program been targeted appropriately?

While we accept that MGN is obliged to deliver a mains replacement program, we would expect that the program would be targeted, so as to prioritise the replacement of high risk gas mains. We sought advice from Zincara, an engineering consultant, on whether the mains replacement program is appropriately targeted. Zincara's advice is summarised in Table 5.4 below, and a full version of the advice is available on the AER's website.

**Table 5.4 Summary of Mains Replacement proposal review by Zincara**

Mains Replacement category	Summary of advice
Low Pressure Cast Iron and Unprotected Steel (CI/UPS) mains	Low pressure cast iron and unprotected steel mains represents 85% of MGN's proposed mains replacement program capex. Zincara's analysis of leaks, fractures and water in mains and services incidents show that MGN's low-pressure mains are in relatively poor condition and continue to deteriorate. Zincara also notes that some PVC (plastic) mains are experiencing increasing rates of leaks, with similar levels to unprotected steel. Zincara notes that an assessment of leaks and fracture rates has been carried out for each postcode in the MGN network. The assessment shows MGN is replacing high risk mains, and also supports the need for a strong replacement program to continue. <sup>36</sup>
Medium Pressure Early Generation High Density Polyethylene Mains (HDPE)	The proposed Early Generation HDPE mains replacement program involves decommissioning 54.5 kms of the oldest early generation HDPE mains and 27.4 km of poor condition steel mains. This makes up 9% of MGN's proposed mains replacement capex. Zincara has assessed the leaks and fracture rate of these assets, and considers they are in poor condition and should be replaced. <sup>37</sup>
Medium pressure – steel and reactive service replacement	The remaining 5% of MGN's proposed mains replacement program, involves medium pressure steel and reactive service replacement. Zincara considers the medium pressure steel works are prudent and efficient. The unit rates on which the estimate is based reflect the most recent three-year average and Zincara recommends the acceptance of the unit costs. <sup>38</sup>

We consider the advice put forward by Zincara is reasonable and demonstrates that MGN's replacement program is appropriately targeted. Consequently, we consider the volume and location of mains replacement is prudent.

<sup>34</sup> ESV, Energy Infrastructure Safety Management Policy. 2019, p. 10.

<sup>35</sup> Zincara report, *MGN AA*, November 2022

<sup>36</sup> Zincara report, *MGN AA Review*. November 2022, p. 6.

<sup>37</sup> Zincara report, *MGN AA Review*. November 2022, p. 7.

<sup>38</sup> Zincara report, *MGN AA Review*. November 2022, p. 7.

#### **5.5.1.4.3 Unit Rates**

MGN's forecast unit rates for low pressure mains replacement during the next access arrangement have increased by 28% over the rates considered by the AER in the 2018–22 final decision. MGN submits this is mainly due to works moving into more costly areas, with higher density and complexity, in addition to general cost pressures in construction.<sup>39</sup> In contrast, the unit rates for medium pressure mains replacement are 52% below those considered in the AER's 2018–22 final decision.<sup>40</sup>

Zincara conducted an analysis of the unit rate methodology used by MGN. The methodology includes a combination of competitive tenders, historical actual rates, density considerations and observations from street walks. Zincara considers that the rates have been developed on a reasonable basis to reflect the best estimate of the work that will be undertaken over the next access arrangement period and represent the best forecast possible in the circumstances.<sup>41</sup>

We accept Zincara's advice as reasonable, and that MGN has taken the necessary steps to deliver its replacement program at the lowest achievable cost. Consequently, we consider the cost of MGN's mains replacement program is efficient.

### **5.5.2 New customer connections**

New customer connections capex includes the cost of assets to connect a customer to the network. This includes the cost of installing new gas mains, service pipes (to connect houses/businesses to the mains) and meters to measure gas consumption.

Distribution businesses have a regulatory obligation to make a connection offer to residential and commercial/industrial customers making applications to connect to its distribution network.<sup>42</sup>

Because of this, the number of customers MGN will need to connect during a five-year access arrangement period – and ultimately the volume of new assets it will need to install to service these customers – mostly depends on factors outside of MGN's control. These include the number of new dwellings being constructed, prevailing regulatory standards (particularly those relating to energy efficiency and carbon reduction, which may lead to fewer new customers installing gas appliances) and level of industrial growth in MGN's distribution footprint.

#### **5.5.2.1 MGN's proposal**

MGN has forecast connections capex of \$94 million in the 2023–28 period. This is substantially lower than MGN's capex of \$128 million in the current period. MGN's reduced its connections capex in response to the Victorian Gas Substitution Roadmap (Roadmap), as

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<sup>39</sup> MGN, *Final Plan Attachment 9.6 Unit Rates Report*, July 2022, p. 41.

<sup>40</sup> MGN, *Final Plan Attachment 9.6 Unit Rates Report*, July 2022, p. 43.

<sup>41</sup> Zincara Report, *MGN AA Review*, November 2022

<sup>42</sup> NGR, rr. 119J, 119K, 119S (1).

it anticipated that government policies to reduce carbon emissions will see many potential new customers opting not to connect to the gas network.<sup>43</sup>

### 5.5.2.2 Our assessment

Based on all the information before us, we are satisfied MGN's capex forecast of \$93.7 million (\$2022–23) for connections is conforming capex.

We assessed MGN's connections capex by considering the likely volume of new customers, and the cost of each new connection (unit cost). Forecast connection volumes are split into two categories, depending on the amount of gas being consumed:

- Volume Tariff (Tariff V) – customers who consume less than 10 Terajoules of gas per year, usually residential and small commercial and industrial<sup>44</sup>
- Demand Tariff (Tariff D) – more than 10 Terajoules of gas per year, typically large commercial and industrial.<sup>45</sup>

MGN has not proposed any connections capex for Tariff D. Consequently, our assessment only concerns Tariff V connections.

### 5.5.2.3 Forecast volume of new connections

MGN's initial proposal used a standard forecasting model to estimate the volume of new connections in the next five years. This involved:

- using the Housing Institute of Australia's (HIA's) forecast of new dwelling construction as a proxy for the number of potential new customers
- determining the proportion of new dwellings that typically connect to the gas network, and trending this forward for the next five years (called the marginal penetration rate)
- multiplying the predicted number of new dwellings by the marginal penetration rate to give a forecast of new connections.

For small commercial and industrial Tariff V customers, MGN used a historical average of connection rates to forecast new connections. This resulted in a relatively small volume of new connections over the access arrangement period.

Following the release of the Roadmap, MGN amended its volume forecast for residential customers, but did not amend its commercial and industrial customers, on the basis that it is unclear how the Roadmap will affect connections in this sector. For residential customers, MGN applied an adjustment to the forecast trend, starting at a 15% reduction in new connections volumes at the start of the period, and ramping up to a 75% reduction in 2027-28. This is based on the expectation that government policies to reduce carbon

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<sup>43</sup> In line with the Roadmap, the Victorian Government will change rules to clarify that connections to new estates are not compulsory and will implement a 7-star energy efficiency rating for new dwellings. This new standard may make the installation of gas appliances less attractive than electric alternatives, as new dwellings will need to meet a carbon emission "budget".

<sup>44</sup> I&C customers are generally classified under Tariff D if they consume more than 10 TJ of gas per year.

<sup>45</sup> I&C customers are generally classified under Tariff V if they consume less than 10 TJ of gas per year.



emissions will become steadily more effective at reducing the rate of new connections over time.

As noted in Attachment 12 on forecast demand, there is significant uncertainty in predicting how a change in government policy will affect demand for natural gas connections. However, it is reasonable to assume that the impact will be greater over time. Dwellings that have already been approved or are currently under construction are not subject to the changes, and it is also reasonable to expect there to be a lag in customer response to the changes, as customers become more familiar with the new framework.

We note that the risk to MGN and gas customers of under or over forecasting new connections is limited by the way MGN's prices are set. MGN is subject to a price cap form of control. That is, MGN's prices are set at the time of the access arrangement and, other than in limited circumstances, such as a cost pass-through, the prices are set for the full period. This contrasts to a revenue cap, where prices are adjusted each year to allow a service provider to recover its revenue allowance (which incorporates its capex forecast), irrespective of demand.

Because MGN is subject to a price cap, if its customer numbers increase above the forecast, it will retain the extra revenue from these customers, which will offset to a large extent the additional cost of connecting the new customers. Conversely, if MGN connects fewer customers than forecast, it will earn less revenue, such that existing customers do not pay for connections that are forecast but do not occur.

We accept that policies flowing from the Roadmap are likely to lead to a reduction in new connections, particularly as the access arrangement period progresses. We consider the volume adjustment proposed by MGN is reasonable and proportionate to the likely change in new dwellings connecting to the gas network, noting that there remains considerable uncertainty about the likely impact of these changes.

#### 5.5.2.4 Unit rates

MGN's proposed unit rates for new connections are higher than its historical rates. MGN has identified two drivers of increases in unit rates:<sup>46</sup>

- The costs of carrying out work will increase over time as additional administrative and safety standards (including access and permit requirements, third party approval processes, etc.) give rise to higher contractor costs. For example, in recent years, local authorities have designated tree protection zones, which require the use of non-destructive excavation (for example, hydro or manual excavation as opposed to mechanical).
- Connections work near existing roads is likely to become more expensive. Road reinstatement specifications and traffic management specifications are becoming more stringent. For example, MGN states it is required to conduct full lane width profiling for roads under five years old, as opposed to patching the road as was previously allowed. This contributes to higher costs, although the impact of this cost pressure on current unit rates has been masked to some extent by volatility in the mix of work completed.

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<sup>46</sup> MGN, *Final Plan Attachment 9.6 Unit Rates Report*, July 2022. p. 12.

We have accepted MGN's unit rates for connection assets on the basis that MGN has demonstrated:<sup>47</sup>

- The current costs incurred reflect competitively tendered contractor costs. These rates are considered efficient as they have been determined through competitive market processes in line with established procurement processes.
- The forecast unit rates are reflective of the most recent 2022 contracted unit rates.
- The forecast rate for new domestic services is likely to be higher as jurisdictional requirements for soil testing will add to the cost of installation.<sup>48 49</sup>

### 5.5.3 Information and communication technology

We are not satisfied that MGN's proposed \$71.4 million (\$2022–23) for information and communication technology (ICT) capex is conforming capex. Our decision is to include \$68.8 million (\$2022–23) for ICT in our alternative capex estimate of conforming capex. Our alternative estimate does not include MGN's proposed cybersecurity uplift but includes all of MGN's other ICT projects.

#### 5.5.3.1 MGN's proposal

MGN's proposed 2023–28 ICT capex of \$71.4 million is \$22.8 million or 47% higher than the actual and estimated ICT capex in the current access arrangement period.

The uplift compared to the current period is largely driven by a major program of work to upgrade MGN's enterprise resourcing planning (ERP), billing and asset management systems to a new platform as the existing platform is being retired and will no longer be supported from 2024.<sup>50</sup>

Table 5.5 sets out MGN's forecast of ICT capex over the next access arrangement period in comparison to the current period (categorised as recurrent or non-recurrent expenditure in line with our Guidance Note on ICT, discussed further below).

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<sup>47</sup> MGN, *Final Plan Attachment 9.6 Unit Rates Report*

<sup>48</sup> MGN, *Final Plan Attachment 9.6 Unit Rates Report*, July 2022, p. 16.

<sup>49</sup> *Environment Protection Regulations 2021*.

<sup>50</sup> MGN (Vic), *Final Plan 2023–28*, July 2022, p. 98.

**Table 5.5 MGN's forecast of current and next access arrangement period ICT capex – recurrent and non-recurrent (\$2022–23, million)**

	2018–22 Actual/Estimate	2023–28 Proposed
<b>Recurrent</b>		
Application renewal	15.0	18.2
Infrastructure renewal	9.9	10.0
Cybersecurity	1.4	2.6
<b>Total recurrent</b>	<b>26.3</b>	<b>30.9</b>
<b>Non-recurrent</b>		
Digital Customer Experience	0.5	3.1
Remote & Digital metering	0	1.3
AGIG One IT Strategy (including MGN ERP)	2.9	36.1
MGN Separation	15.9	0
Life Support	1.3	0
Work Planning & Scheduling	1.7	0
<b>Total non-recurrent</b>	<b>22.3</b>	<b>40.5</b>
<b>Total ICT capex</b>	<b>48.6</b>	<b>71.4</b>

Note: Totals may not sum due to rounding

Source: AER analysis

### 5.5.3.2 Assessment approach

Our assessment approach to ICT capex is outlined in our Guidance Note on Non-network ICT capex assessment approach (Guidance Note).<sup>51</sup> We require the businesses to allocate their ICT expenditure into two categories, 'recurrent' ICT and 'non-recurrent' ICT. Recurrent ICT is expenditure that is related to maintaining existing IT services, functionalities, capability and/or market benefits, and occurs at least once every five years.<sup>52</sup> Non-recurrent ICT is any ICT expenditure that is not 'recurrent' and generally includes major upgrades or major version transitions, complying with new obligations and new or expanded ICT functionality.<sup>53</sup>

We are satisfied that MGN has accurately classified its recurrent and non-recurrent ICT expenditure in accordance with the Guidance Note.

In assessing MGN's proposed recurrent ICT capex for the 2023–28 access arrangement period, we have analysed the information provided in MGN's proposal, including business cases, additional material provided by MGN,<sup>54</sup> and RIN data.

Having reviewed the cost estimates, business cases and relevant models, we consider MGN's proposed ICT capex has been largely derived on a reasonable basis. The exception

<sup>51</sup> AER, *Non-network ICT capex assessment approach*, November 2019.

<sup>52</sup> AER, *Non-network ICT capex assessment approach*, November 2019, p. 8.

<sup>53</sup> AER, *Non-network ICT capex assessment approach*, November 2019, pp. 8–9.

<sup>54</sup> Including material provided in response to ICT discussions held with AGIG on 21 October 2022.

is MGN's cyber security uplift which we consider is not required for gas distribution businesses.

#### 5.5.3.2.1 Recurrent ICT

MGN's recurrent projects are consistent with its strategy of refreshing its operating systems and consists of:

- renewal of applications – 'stay in business' expenditure that involves periodic updates to critical business software applications, in particular, vendor version updates<sup>55</sup>
- renewal of infrastructure – 'stay in business' expenditure that involves periodic renewal of network and end-user devices such as SCADA, laptops, audio/visual equipment, telephony, internet links and servers that support critical business functions<sup>56</sup>
- an uplift in cybersecurity capabilities to achieve and maintain Maturity Indicator Level 3 (MIL-3) as measured against the Australian Energy Sector Cyber Security Framework (AESCSF).<sup>57</sup>

Our assessment of these projects is that they largely constitute conforming capex. The increase in recurrent expenditure is being driven by application renewals and MGN's proposed cyber security uplift. The reason for the modest increase in the recurrent applications renewal expenditure compared the current period is that this takes into account the separation of United Energy, following Australian Gas Infrastructure Group's (AGIG) acquisition of MGN, which was not forecast and included in the current period expenditure. We consider MGN's approach to application renewal is in line with good industry practice and the scope and methodology to determine costs is considered reasonable.

However, we consider MGN's proposed cyber security uplift is not prudent and efficient and does not constitute conforming capex for the reasons outlined below.

#### Cyber security

MGN proposed \$2.6 million (\$2022–23) to uplift its cyber security capabilities.<sup>58</sup> The proposed expenditure includes technology solutions and project implementation to uplift the capabilities to MIL-3/Security Protection Level 3 (SP 3) across all its networks.<sup>59</sup>

While we recognise MIL-3/SP 3 is an appropriate standard for transmission businesses under the *Security Legislation Amendment (Critical Infrastructure Protection) Act 2022 (Act)*, there is currently no obligation for MGN to achieve the capabilities of a maturity level MIL-3/SP 3 for its gas distribution business. We consider the proposal to achieve MIL-3/SP 3 capabilities for the gas distribution network is higher than the efficient investment required to meet the likely security capabilities under the Act.

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<sup>55</sup> MGN (Vic), *Attachment 9.9 – IT Investment Plan*, July 2022, p. 17.

<sup>56</sup> MGN (Vic), *Attachment 9.9 – IT Investment Plan*, July 2022, p. 19.

<sup>57</sup> MGN (Vic), *Attachment 9.9 – IT Investment Plan*, July 2022, p. 20.

<sup>58</sup> MGN (Vic), *Attachment 9.9 – IT Investment Plan*, July 2022, p. 21.

<sup>59</sup> MGN (Vic), *Attachment 9.9 – IT Investment Plan*, July 2022, pp. 20–21.

We have not included the \$2.6 million (\$2022–23) of expenditure MGN proposed to uplift its business to MIL-3/SP 3.

#### **5.5.3.2.2 Non-recurrent ICT**

MGN's proposed non-recurrent ICT expenditure is primarily driven by its AGIG One IT Strategy program.

The program commenced in 2019 and seeks to consolidate IT solutions, such as moving all AGIG businesses on to a single enterprise resource planning system.<sup>60</sup> The program has been split into two stages, with the majority of stage 1 to be completed in the current period and the remainder of the transition program planned for the forecast period.<sup>61</sup>

The strategy is being applied across AGIG's gas networks and is consistent with our review of the AGN (SA) Access Arrangement in 2020.<sup>62</sup>

We received one submission from the Brotherhood of St. Laurence (consultants, TRAC Partners) concerning MGN's IT expenditure proposal. They submitted that MGN should provide further information about the actual capex included in ICT and the extent to which the costs have been allocated between the various AGIG businesses, in light of the AGIG merger in 2017/18.<sup>63</sup>

The merger occurred in 2017, with the Australian Gas Network businesses, MGN and Dampier Bunbury Pipeline coming together to form AGIG. During the current access arrangement period MGN completed a program to separate MGN's IT from its former owner, United Energy.<sup>64</sup>

The key aspect of MGN's IT expenditure in the forecast period is the move to the AGIG enterprise resourcing planning system, which has already occurred for AGN. The full cost of this transition is being met by MGN.<sup>65</sup> The other components are the transformation initiatives, including data architecture and reporting, and the cyber security uplift (which we have not accepted for the above reasons). MGN's share of these AGIG programs are 28% and 16%, respectively.<sup>66</sup>

We consider the scope of the proposed One IT Strategy program, including the approach of using an independent expert to develop cost estimates, supported by market and vendor quotes, industry norms and historical costing to determine project cost, is a reasonable approach.

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<sup>60</sup> MGN (Vic), *Attachment 9.9 – IT Investment Plan*, July 2022, p. 24.

<sup>61</sup> MGN (Vic), *Attachment 9.19 – IT Business Cases*, July 2022, p. 44.

<sup>62</sup> AER, Draft Decision, *Australian Gas Networks (SA) Access Arrangement 2021-26, Attachment 5 – Capital expenditure*, November 2020, pp. 30–31.

<sup>63</sup> TRAC Partners for Brotherhood of St. Laurence, *Response to 2023-28 access arrangement proposals*, September 2022, p. 79.

<sup>64</sup> MGN (Vic), *Attachment 9.9 – IT Investment Plan*, July 2022, p. 3.

<sup>65</sup> MGN (Vic), *Attachment 9.19 – IT Business Cases*, July 2022, p. 48.

<sup>66</sup> MGN (Vic), *Attachment 9.19 – IT Business Cases*, July 2022, p. 48.

### 5.5.4 Other distribution system assets

Other distribution system assets are items other than mains or meter replacement, connection, augmentation or IT and include:

- completion of modifications of high-pressure mains to allow inline inspection
- maintenance and replacement of a series of smaller items, regulators, valves and cathodic protection equipment
- hydrogen readiness program.

#### 5.5.4.1 MGN's Proposal

MGN proposed to spend \$31.8 million on other assets in the upcoming period, compared to the \$19.6 million it spent in the current period. This includes expenditure totalling \$22.8 million to complete modifications of high-pressure mains to allow inline inspection, maintain and replace a series of smaller items, regulators, valves and cathodic protection equipment. MGN also proposed \$9 million for hydrogen readiness expenditure in the upcoming period.

##### 5.5.4.1.1 Other distribution assets (not including hydrogen readiness)

We are satisfied MGN's capex forecast of \$22.8 million (\$2022–23) for other distribution assets (not including hydrogen readiness) is conforming capex.<sup>67</sup>

MGN has proposed modifications of high-pressure mains to allow inline inspection, maintain and replace a series of smaller items, regulators, valves and cathodic protection equipment. The program includes \$11 million to modify MGN's higher-pressure transmission mains to allow inline inspection in accordance with accepted good industry practice.<sup>68</sup> The increase in expenditure associated with these works reflects increased unit rates. MGN notes that unit rates have been impacted by supply chain disruptions and skills shortages. MGN expects these disruptions to continue during the coming years as the global economy emerges from pandemic conditions. Higher safety and administrative standards are also giving rise to increased contractor costs.<sup>69</sup> We accept that these factors are likely to increase unit costs.

Based on the information before us the proposal is in line with good industry practice. We accept that the program is prudent and efficient.

##### 5.5.4.1.2 Hydrogen readiness

MGN proposed \$9 million in capex to undertake a technical assessment of the network's ability to withstand exposure to hydrogen blended natural gas.

MGN proposes the following:<sup>70</sup>

- bring sites up to a higher hazardous area classification standard (\$6 million)

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<sup>67</sup> NGR r. 79 (2) (c) (i),(ii)

<sup>68</sup> MGN, *Vic Final Plan 2023-24\_July 2022*, p. 99.

<sup>69</sup> MGN, *Final Plan Attachment 9.6\_Unit Rates Report*, July 2022, p. 5.

<sup>70</sup> MGN, *Vic Final Plan 2023-24*, July 2022, p. 100.

- implement revised in-service welding procedures and reinforce existing welds where required and undertake hardness testing for a random sample of welds in each pipeline to show compliance with hardness limits (\$3 million)
- a further \$0.2 million for capacity review of network regulating stations, transmission pipeline compatibility assessments, review of hazardous areas in the network and updates to a number of processes, procedures and work plans.

MGN proposed the program on the basis that it is required to maintain the safety and integrity of the MGN network, and to ensure its gas distribution networks are ready for the introduction of renewable gas.

#### 5.5.4.2 Our assessment

Generally, stakeholder submissions were not supportive of the proposed expenditure:

- Consumer Challenge Panel (CCP28) said that stakeholders held the view that accelerated depreciation is inconsistent with increased capex and proposed hydrogen expenditure
- Friends of the Earth did not support hydrogen expenditure proposals as they do not consider 100% hydrogen a reality and they consider 10% to be a delaying tactic<sup>71</sup>
- EUAA asked why customers should have to effectively pay for a high-risk option that pipeline hydrogen/renewable gas will be economic in the not-too-distant future
- Brotherhood of St Laurence and TRAC partners said expenditure to accommodate hydrogen blends in the network should not be funded
- EnergyAustralia do not believe that there is any need, desire, or latent industry, which requires distribution networks to supply hydrogen to residential customers via the distribution network. EnergyAustralia believes that the AER should remove any expenditure for hydrogen readiness and communication/education. They note that any investment in assets (hydrogen or non-hydrogen) poses a stranded asset risk
- Origin are open to hydrogen expenditure, however, they agree with AusNet Gas Services' (AusNet) approach of applying a pass-through if a legislative requirement for hydrogen blending is introduced in the next access arrangement period.<sup>72</sup>

We note that expenditure on hydrogen readiness is relatively new in the context of natural gas distribution networks. The National Gas Law (NGL) has defined natural gas as being a hydrocarbon, predominantly consisting of methane.<sup>73</sup> Because of this, expenditure proposed to allow the safe distribution of hydrogen has not previously been capable of being conforming capex, and therefore not capable of approval in an access arrangement. Energy Ministers from the various governing jurisdictions have proposed amending the Law to change the definition of natural gas to include hydrogen.<sup>74</sup> This would allow expenditure on hydrogen related assets to be approved in an access arrangement, where such expenditure

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<sup>71</sup> Friends of the Earth Melbourne, *Submission to 2023-28 gas distribution access arrangement proposals*, September 2022

<sup>72</sup> AusNet, *Gas Access Arrangement review 2024-28 – Addendum to proposal*, 2 September 2022, p. 30.

<sup>73</sup> NGL, s. 2, definition of “natural gas”.

<sup>74</sup> Energy ministers meeting communique meeting, 28 October 2022.

met the new capex criteria. This reform is in train and may be enacted prior to the release of our final decision.

As part of this process, the Australian Energy Market Commission (AEMC) has conducted a review into including hydrogen in the regulatory framework. The final report<sup>75</sup> of this review outlines the AEMC’s view on how the current rules will operate with a change to the definition of natural gas. In particular, the report draws a distinction between investments in hydrogen readiness that have been mandated, and where such investments are voluntary. In particular, the AEMC stated:

If a government does not mandate that a pipeline change to transporting another covered gas, but a service provider elects to do so, then, in the case of a scheme pipeline, the regulator would need to assess the proposal having regard to the expenditure criteria in Part 9 of the NGR. In keeping with these criteria, the regulator would need to consider whether the proposed capital expenditure:<sup>76 77</sup>

- satisfies the prudent and efficient test
- is justifiable on the grounds that either the overall economic value of the expenditure is positive, or the present value of the expected incremental revenue to be generated as a result of the expenditure exceeds the present value of the expenditure.
- the proposed operating expenditure satisfies the prudent and efficient test.<sup>78</sup>

Further, regarding safety, the AEMC noted:

rule 79(2)(c) also provides for capital expenditure to be justifiable if it is necessary to maintain and improve the safety of services, maintain the integrity of services, comply with a regulatory obligation or requirement, or maintain the service provider’s capacity to meet levels of demand for services existing at the time of the capital expenditure. A voluntary transition to another gas is not expected to be justifiable on any of these grounds.<sup>79</sup>

The AEMC’s view is therefore that a safety case is not sufficient to justify expenditure on hydrogen readiness where a service provider has voluntarily decided to introduce hydrogen into its network. The expenditure would need to pass a positive economic benefits test to be conforming capex. MGN has not, at this stage, provided evidence that the proposed expenditure meets such a test.

Given this, we do not consider MGN’s proposed \$9 million of hydrogen readiness capex is conforming, and have excluded this from our alternative estimate.

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<sup>75</sup> AEMC, *Review into extending the regulatory frameworks to hydrogen and renewable gases – Final report*, 8 September 2022

<sup>76</sup> AEMC, *Review into extending the regulatory frameworks to hydrogen and renewable gases – Final report*, 8 September 2022, p29.

<sup>77</sup> NGR, r. 79.

<sup>78</sup> NGR, r. 91.

<sup>79</sup> AEMC, *Review into extending the regulatory frameworks to hydrogen and renewable gases – Final report*, 8 September 2022, p. 29.



### 5.5.5 Meter replacement

Gas meters are primarily used to measure gas consumption at a particular location, such as at a residential home or business. Meter replacement is an ongoing capex activity. Over time, meters lose their ability to accurately measure consumption and may also develop other faults. Meters may be replaced as part of a planned program, usually based on age, or when meters are found to be defective. MGN has regulatory obligations to manage the integrity of meters and ensure they operate within the prescribed tolerance band for metering accuracy.

#### 5.5.5.1 MGN’s proposal

MGN forecast metering capex of \$22.4 million to replace approximately 173,000 meters over the 2022–28 period.<sup>80</sup> This is a 6.5% increase over the current (2018–22) period, largely driven by continued replacement of time expired meters when they fall due and reflects the age profile of meters. In the current period (2018–22), MGN expects to replace more than 137,352 meters at a total cost of \$15.9 million.

#### 5.5.5.2 Our assessment

Based on all the information before us, we are satisfied MGN’s capex forecast of \$22.4 million for meter replacement is conforming capex.

We consider MGN’s meter replacement volumes are largely in line with historical expenditure, and reflect the age profile of its meter fleet, and its obligation to test and replace old meters.

We note that MGN’s unit rate for meter replacement is 3% higher than its historical rate. However, we are satisfied that this represents an efficient cost, as contractor rates were subject to competitive tender.<sup>81</sup> MGN also refurbishes approximately 50% of its failed I&C meters, leading to cost savings that are reflected in its forecast.<sup>82</sup>

On balance, we consider the meter replacement program to be prudent and efficient.

### 5.5.6 Telemetry

Telemetry systems are used by distribution businesses to monitor network conditions in real time and, in some cases, for the remote control of gas flows and pressures to optimise system performance and maximise safety. Improvements in these systems will reduce the risk of major supply interruption<sup>83</sup> and provide more accurate, reliable and timely pressure data to better inform network capacity models.<sup>84</sup>

MGN is proposing \$4.5 million for telemetry capex. This is broadly consistent with the current period expenditure of \$5 million. MGN is replacing parts of its SCADA and communications

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<sup>80</sup> Friends of the Earth Melbourne, *Submission to 2023-28 gas distribution access arrangement proposals*, September 2022, p. 98.

<sup>81</sup> MGN, *Final Plan \_Attachment 9.6\_ Unit Rates Report*, July 2022, p. 4.

<sup>82</sup> MGN, *Final Plan \_Attachment 9.6\_ Unit Rates Report*, July 2022, p. 37.

<sup>83</sup> NGR, r. 79(2)(c)(i)

<sup>84</sup> NGR, r. 79(2)(c)(ii)

fleet that are aging and at risk of failure, hazardous area rectification and continuation of its network monitoring program.<sup>85</sup>

#### 5.5.6.1 Our assessment

Our draft decision is to accept MGN's forecast telemetry capex of \$4.5 million (\$2022/23, direct costs). We are satisfied MGN's capex forecast for telemetry is required conforming capex that complies with rule 79.<sup>86</sup>

We consider that MGN's proposed Telemetry capex expenditure of \$4.5 million (\$2022–23) is reasonably likely to reflect prudent and efficient costs for the following reasons:

- the majority of MGN's telemetry capex projects are driven by compliance requirements which we consider is consistent with good gas industry practice
- MGN has presented risk assessments which identify the need
- we accept that aging equipment life is a driver of the program
- forecast telemetry capex is consistent with telemetry capex in other networks in Victoria.

#### 5.5.7 Augmentation

Network augmentation capex is directed at increasing the capacity of the existing network to meet the demands of existing and future customers. Augmentation capex is required to maintain gas pressure and minimise the risk of gas outages.

MGN has proposed augmentation of \$1.5 million. This is a significant reduction from the \$18 million it spent on augmentation in the current access arrangement. This is largely due to the impact of lower growth.

We are satisfied MGN's capex forecast of \$1.5 million (\$2022–23) for augmentation is conforming capex. The project is modest compared to previous access arrangements and reflects the lower growth expectations in the upcoming access arrangement period.

#### 5.5.8 Capitalised overheads

Overheads are costs that are not directly attributable to the output of distribution businesses but are necessary to support its operations. Examples of overhead costs include network planning, procurement and human resources.

According to the RIN, MGN only capitalises network overheads and disaggregates its capitalised overheads into the following subcategories/functions:

- operations and maintenance
- planning and system design
- procurement and fleet
- technical assurance

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<sup>85</sup> MGN, *Final Plan\_Attachment 9.13\_SCADA Strategy*, July 2022. p. 4,12

<sup>86</sup> NGR, rr. 79(2)(c)(i), 79(2)(c) (ii).

- network engineering
- general support.

In the 2018–22 period, MGN estimates it will spend \$27.6 million (\$2022–23, direct cost) of capitalised overheads. We accept MGN's proposal of \$29.7 million (\$2022–23, direct cost) of capitalised overheads in the 2023–28 period as conforming capital expenditure.

MGN's proposed forecast methodology for capitalised overheads is principally consistent with our previous decisions and has come down in line with the reduced capital program. We accept the forecast capitalised overheads of \$29.7 million as conforming capex.

## Glossary

Term	Definition
AA	Access arrangement
AEMC	Australian Energy Market Commission
AER	Australian Energy Regulator
AESCSF	Australian Energy Sector Cyber Security Framework
AGIG	Australian Gas Infrastructure Group
AGN	Australian Gas Networks (Victoria and Albury)
AusNet	AusNet Gas Services
Capex	Capital expenditure
CI	Cast iron
ERP	Enterprise resourcing planning
ESV	Energy Safe Victoria
FIR	Fracture Incident Rate
HDPE	High density polyethylene
HIA	Housing Institute of Australia
I&C	Industrial and commercial
ICT	Information and communication technology
IT	Information technology
LIR	Leakage Incident Rate
MIL-3	Maturity Indicator Level 3
MGN	Multinet Gas Networks
NGL	National Gas Law
NGO	National Gas Objective
NGR	National Gas Rules
opex	Operating expenditure
RFM	Roll forward model
RIN	Regulatory Information Notice
Roadmap	Gas Substitution Roadmap
SCADA	Supervisory Control And Data Acquisition
SMP	Safety Management Plan
SMSy	Safety Management System
SP 3	Security Protection Level 3
TJ	Terajoules
TP pipeline	Transmission pressure pipeline
UPS	Unprotected steel
Zincara	Zincara Pty Ltd