



*Biodiversity Project, Coorong, South Australia*

February 2023

# Bell Potter Unearthed Conference



# Disclaimer

This document contains summary information about Cooper Energy and its activities as at the date of this document and should not be considered to be comprehensive or to comprise all the information which a shareholder or potential investor in Cooper Energy may require in order to determine whether to deal in Cooper Energy shares. The information is a general summary only and does not purport to be complete. It should be read in conjunction with Cooper Energy's periodic reports and other continuous disclosure announcements released to the Australian Securities Exchange, which are available at [www.asx.com.au](http://www.asx.com.au).

This document contains forward looking statements. These statements are subject to risks associated with the oil and gas industry. The Company believes the expectations reflected in these statements are reasonable. A range of variables or changes in underlying assumptions may affect these statements and may cause actual results to differ. These variables or changes include but are not limited to price, demand, currency, geotechnical factors, drilling and production results, development progress, operating results, engineering estimates, reserve estimates, environmental risks, physical risks, regulatory developments, approvals and cost estimates.

Cooper Energy makes no representation, assurance or guarantee as to the accuracy or likelihood of fulfilment of any forward-looking statement or any outcomes expressed or implied in any forward-looking statement. Except as required by applicable law or the ASX Listing Rules, Cooper Energy disclaims any obligation or undertaking to publicly update any forward-looking statements, or discussion of future financial prospects, whether as a result of new information or of future events.

The following are non-IFRS measures: EBITDAX (earnings before interest, tax, depreciation, depletion, exploration, evaluation and impairment); EBITDA (earnings before interest, tax, depreciation, depletion and impairment); EBIT (earnings before interest and tax); underlying profit; and free cash flow (operating cash flows less investing cash flows net of acquisitions and disposals and major growth capex less lease liability payments). The Company presents these measures to provide an understanding of the Company's performance. They are not audited but are from financial statements reviewed by the Company's auditor. Underlying profit excludes the impacts of asset acquisitions and disposals, impairments, hedging, and items that fluctuate between periods.

Numbers in this report have been rounded. As a result, some figures may differ insignificantly due to rounding and totals reported may differ insignificantly from arithmetic addition of the rounded numbers.

Approved and authorised for release by David Maxwell, Managing Director, Cooper Energy Limited, Level 8, 70 Franklin Street, Adelaide 5000.

Footnotes are located at the end of the presentation on slides 18-19.

## Key Contacts

**Investor enquiries:** Morgan Wright, Investor Relations Lead. +61 437 569 711

**Media enquiries:** Bindi Gove, Head of External Affairs. +61 406 644 913

# Cooper Energy—snapshot

## The pure play on the Australian East Coast gas market

### Introduction

- ✓ Domestic gas producer supplying structurally short South-east Australia gas market
- ✓ Net zero since FY20 & certified carbon neutral
- ✓ Operator for offshore production and onshore gas processing
- ✓ Ability to optimise across hubs to maximise value
- ✓ 39.6MMboe 2P reserves (97% gas) and 36.9MMboe 2C resources (89.4% gas)
- ✓ Headquartered in Adelaide

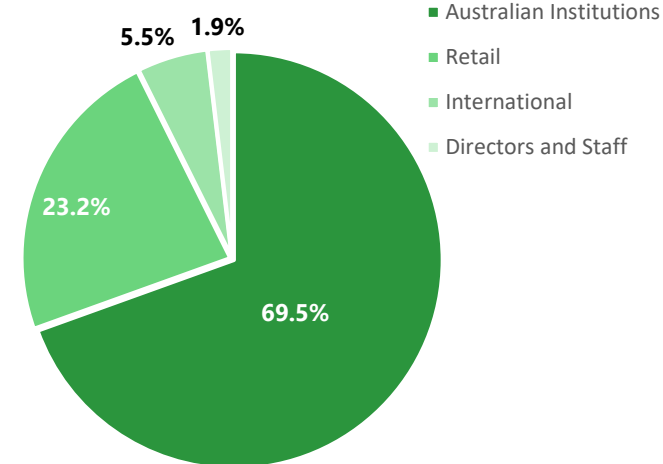
### FY22 key results, A\$million except where noted

	FY21	FY22	Change
<b>Production, MMboe</b>	2.63	3.31	▲ 26%
<b>Revenue</b>	131.7	205.4	▲ 56%
<b>Underlying EBITDAX</b>	30.0	80.7	▲ 169%
<b>Operating cashflow</b>	8.1	57.8	▲ 614%
<b>Underlying profit</b>	(25.9)	14.4	N/M



### Market capitalisation and share register at 31 Dec 2022

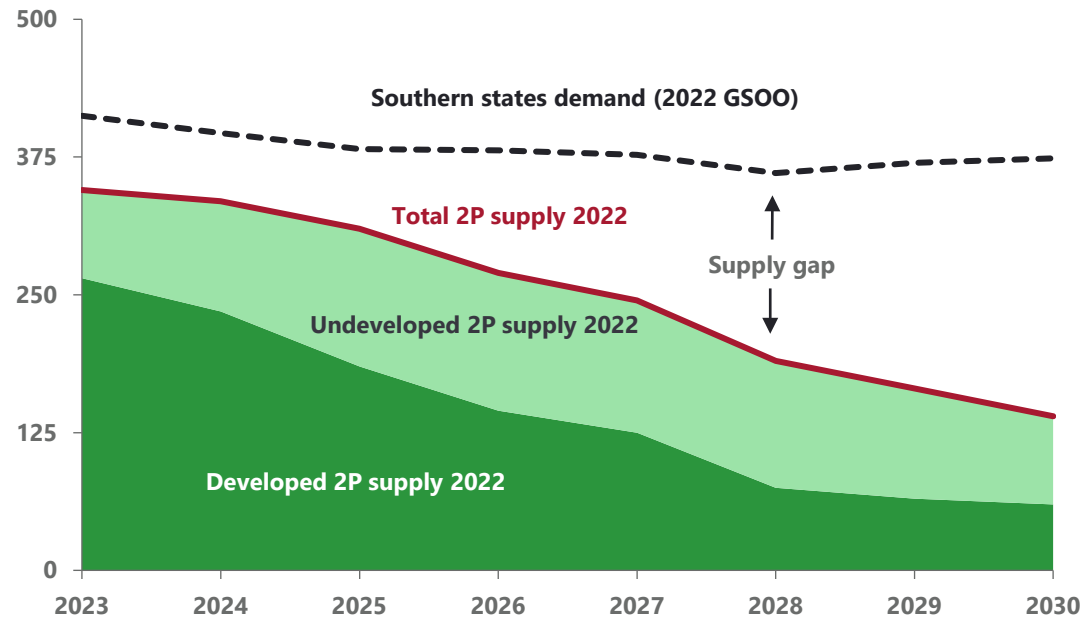
<b>Ticker</b>	ASX:COE
<b>Number of shares outstanding, MM</b>	2,628.7
<b>30 day VWAP, A\$/share</b>	0.19
<b>Market capitalisation, A\$MM</b>	500
<b>Net debt, A\$MM</b>	70
<b>Enterprise value, A\$MM</b>	570



# Tightening East Coast Australia gas supply

Attractive gas market dynamics underwriting new developments

Southern states forecast supply/demand, ACCC (PJ pa)<sup>1, 2</sup>



Spot gas prices LTM (\$/GJ)<sup>3</sup>

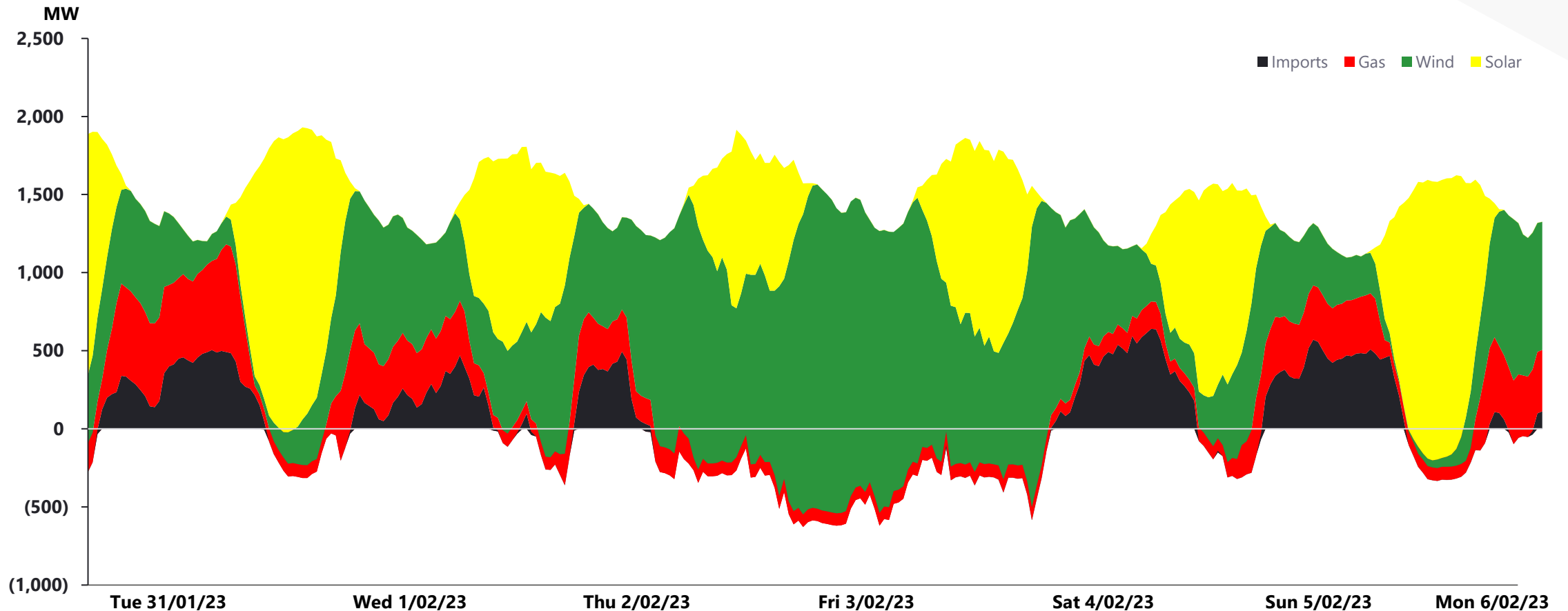


Medium-term ACCC forecast a guide for future gas sales agreements

# South Australia electricity supply—last week

SA energy mix is a window to the future, where gas remains key amidst variable renewables

South Australian electricity supply by type: 31/01/2023 – 6/02/2023<sup>1</sup>



# Cooper Energy—net zero since FY20

## Independently audited and certified by Climate Active



- ✓ Committed to maintaining net zero status via three pillar approach



### Net Zero Enabler

- Leverage carbon neutral benefits
- Differentiated access to capital to fund further growth
- Partner of choice, attracts new hires and helps retention



### Efficiency

- Site/operations focus
- Reduce gross emissions intensity



### New Energy

- Gas remains core
- Investment and partnerships in offset generation projects



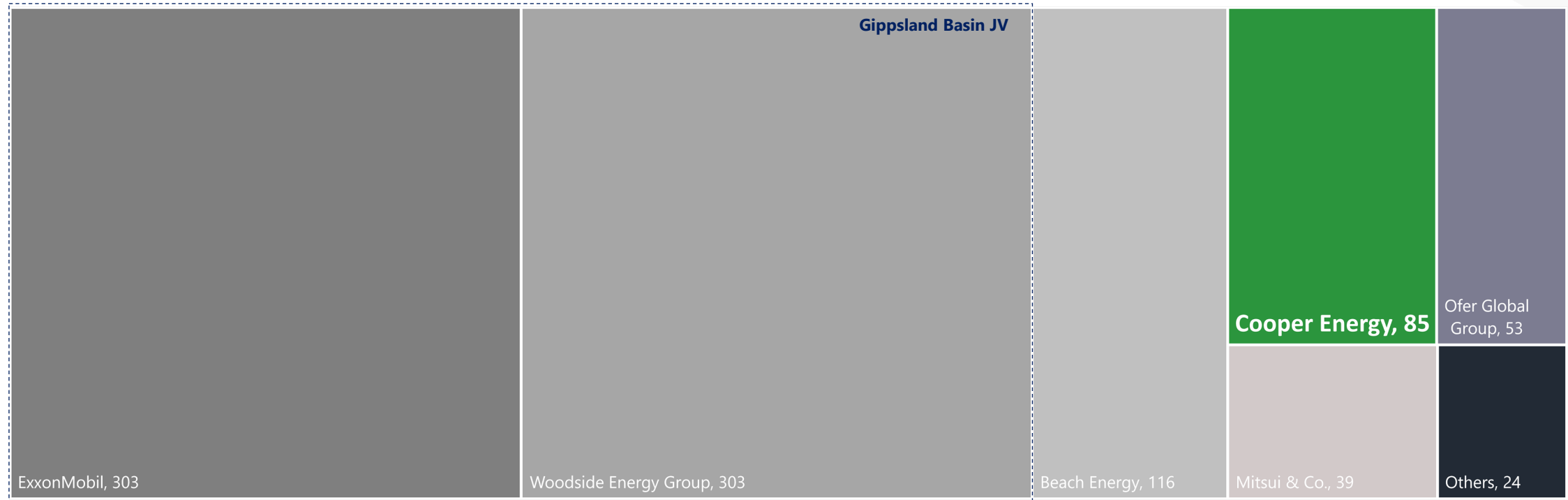
Biodiversity project, Coorong, South Australia

**Cooper Energy's net zero position is a key competitive advantage**

# Cooper Energy—*the* pure play on Australia's East Coast gas market

Net zero today and a bias to early life-cycle reserves


Gippsland, Otway & Bass Basins, net remaining WoodMac commercial reserves (MMboe)<sup>1</sup>

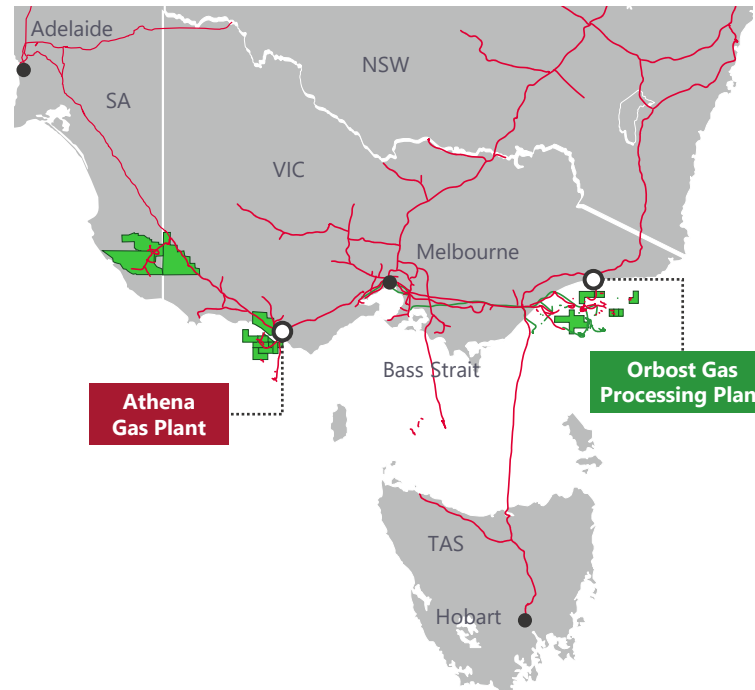



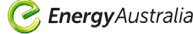


Cooper Energy is the number 3 player, and the only company focused purely on the South-east Australia gas market

# Twin hub access, very close to the South-east Australia gas market

Strengthened operating expertise across integrated upstream and midstream gas projects

Otway Basin	
<b>Ownership</b>	<ul style="list-style-type: none"> <li>Cooper Energy – 50% and operator</li> <li>Mitsui E&amp;P Australia – 50%</li> </ul>
<b>Upstream</b>	<ul style="list-style-type: none"> <li>Casino, Henry and Netherby gas fields</li> <li>Otway Phase 3 Development (FID subject to marketing, finance, rig availability and JV approval)</li> <li>Prospective resources</li> </ul>
<b>Midstream</b>	<ul style="list-style-type: none"> <li>Athena Gas Plant – processing capacity of up to ~150 TJ/day<sup>1</sup></li> <li>Third-party gas processing opportunities possible</li> </ul>
<b>GSA</b> s	
<b>Spot</b>	<ul style="list-style-type: none"> <li>965 TJ sold into spot market in CY22 at an average price of \$19.81/GJ</li> </ul>



Gippsland Basin	
<b>Ownership</b>	<ul style="list-style-type: none"> <li>100% owned and operated by Cooper Energy (post transfer of major hazard facilities licence)</li> </ul>
<b>Upstream</b>	<ul style="list-style-type: none"> <li>Sole gas field</li> <li>Manta development (subject to FID)</li> <li>Prospective resources</li> </ul>
<b>Midstream</b>	<ul style="list-style-type: none"> <li>OGPP – processing capacity of up to ~68 TJ/day<sup>2</sup></li> <li>Third-party gas processing opportunities possible</li> </ul>
<b>GSA</b> s	   
<b>Spot</b>	<ul style="list-style-type: none"> <li>1,600 TJ sold into spot market in CY22 at an average price of \$16.11/GJ</li> </ul>

High spot prices mean small incremental volumes can have significant impact to cash generation



# Otway Basin gas hub

Foundation to develop Cooper Energy's proven and prospective Otway gas portfolio

## Otway phase-3 development

- Development of Annie gas discovery 64.8 PJ 2C (100% basis)<sup>1</sup>
- Drilling campaign based around Annie + 2 low-risk exploration wells, close to market and fast tie-back opportunity
- FEED commenced in Dec 2022 quarter, FID timing subject to marketing, finance, rig availability and JV approval
- Timing now subject to impact of Federal government intervention

## Mean prospective resources<sup>2,3</sup>

Prospect	Gross (Bcf)	COE net (Bcf)	Pg <sup>4</sup>	Amplitude support
Elanora	161	81	67%	✓
Isabella	149	74	70%	✓
Heera	86	43	63%	✓
Pecten East	76	38	73%	✓
Nestor	64	64	81%	✓
Juliet	49	24	84%	✓
<b>Total</b>	<b>585</b>	<b>325</b>		



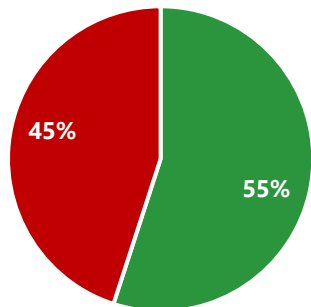
Portfolio of high-quality prospects provides next wave of growth and cash flow generation

# Exploration success rates in the Offshore Otway Basin are world class

## 94% success rate for seismic amplitude supported prospects

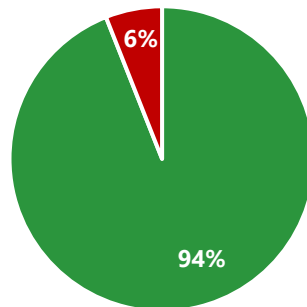
- 29 exploration wells drilled in the Offshore Otway Basin
  - 16 gas field discoveries to date (success rate 55%)
- Modern seismic data has dramatically improved success rates
- Very strong correlation between presence of gas and seismic amplitude
  - 94% success rate for seismic amplitude supported targets

All targets drilled—  
Offshore Otway Basin



Total wells = 29

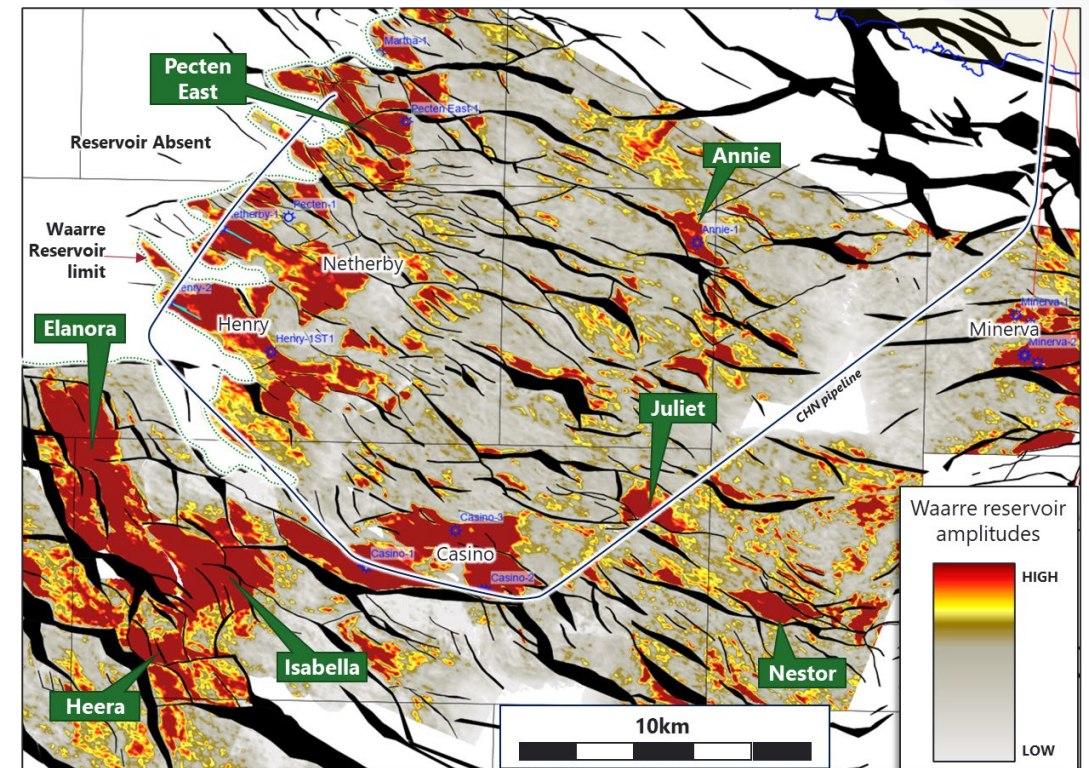
All seismic amplitude supported targets drilled—Offshore Otway Basin



Total wells = 17<sup>1</sup>

■ Success  
■ Failure

Waarre Formation seismic amplitude map showing target prospects



**Cooper Energy has six Otway seismic amplitude supported targets ready to drill in the Otway**

# Gippsland Basin gas hub

Foundation to develop Cooper Energy's proven and prospective Gippsland gas portfolio

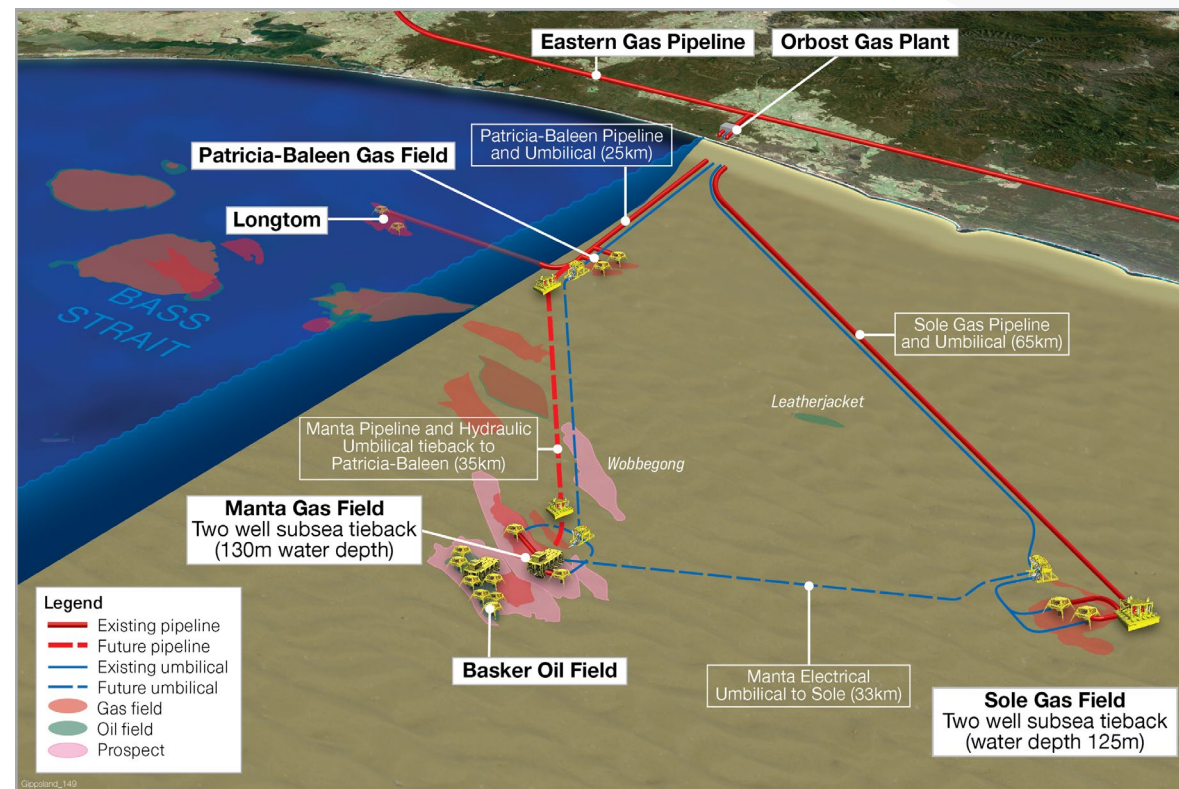
## Manta Contingent Resource estimates<sup>1</sup>

		1C	2C	3C
Gas	PJ	78	121	190
Condensate	MMbbl	2.2	3.4	5.4

- Future development option, COE interest 100%
- Manta-3 appraisal well planned in future campaign
- Deepening Manta-3 tests Manta Deep exploration prospect
- May utilise existing infrastructure e.g., existing pipelines to OGPP

## P50 Prospective Resource (COE 100% interest)<sup>2</sup>

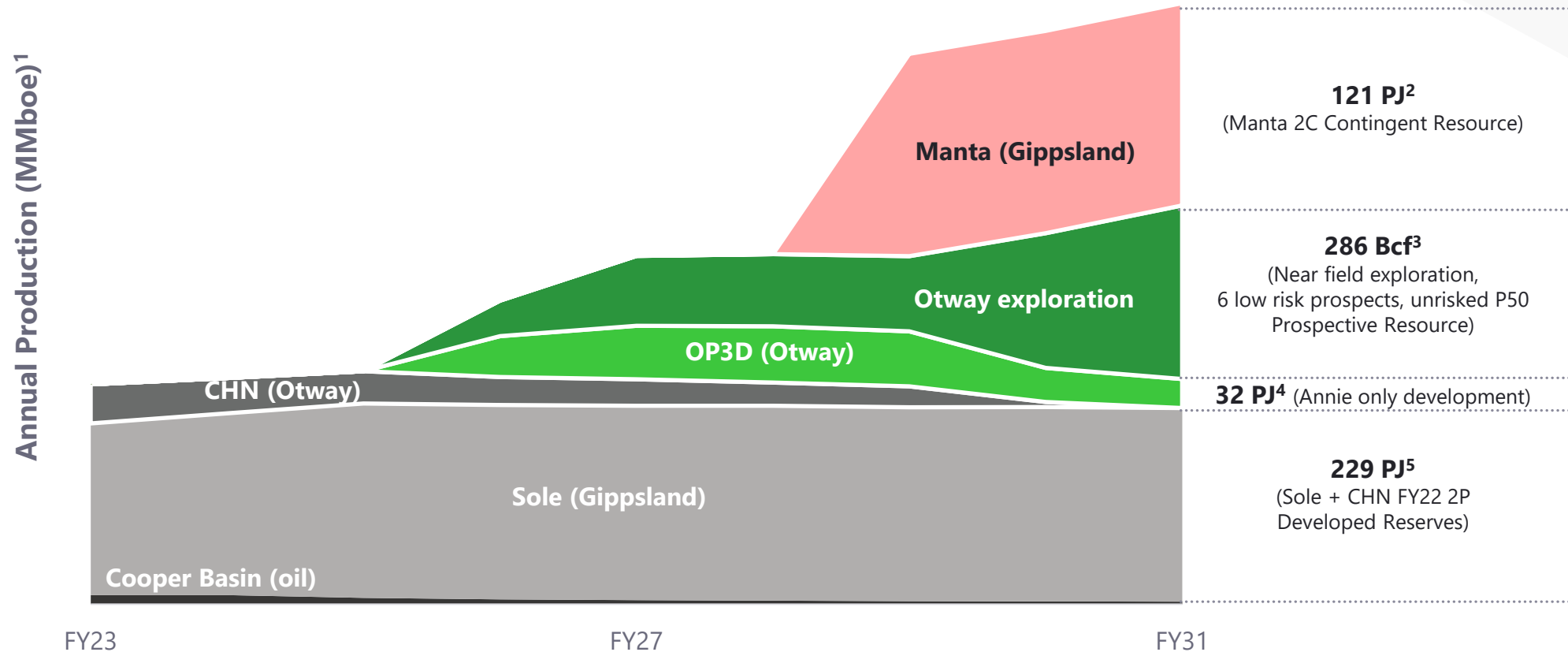
Prospect	COE net (Bcf)	Pg <sup>3</sup>
Manta Deep <sup>4</sup>	467	25%
Chimaera East <sup>4</sup>	203	31%
Wobbegong <sup>5</sup>	192	34%



Prolific hydrocarbon basin immediately adjacent to the South-east gas Australia market

# Growth staircase

High value twin hub growth pipeline of producing, development and exploration prospects

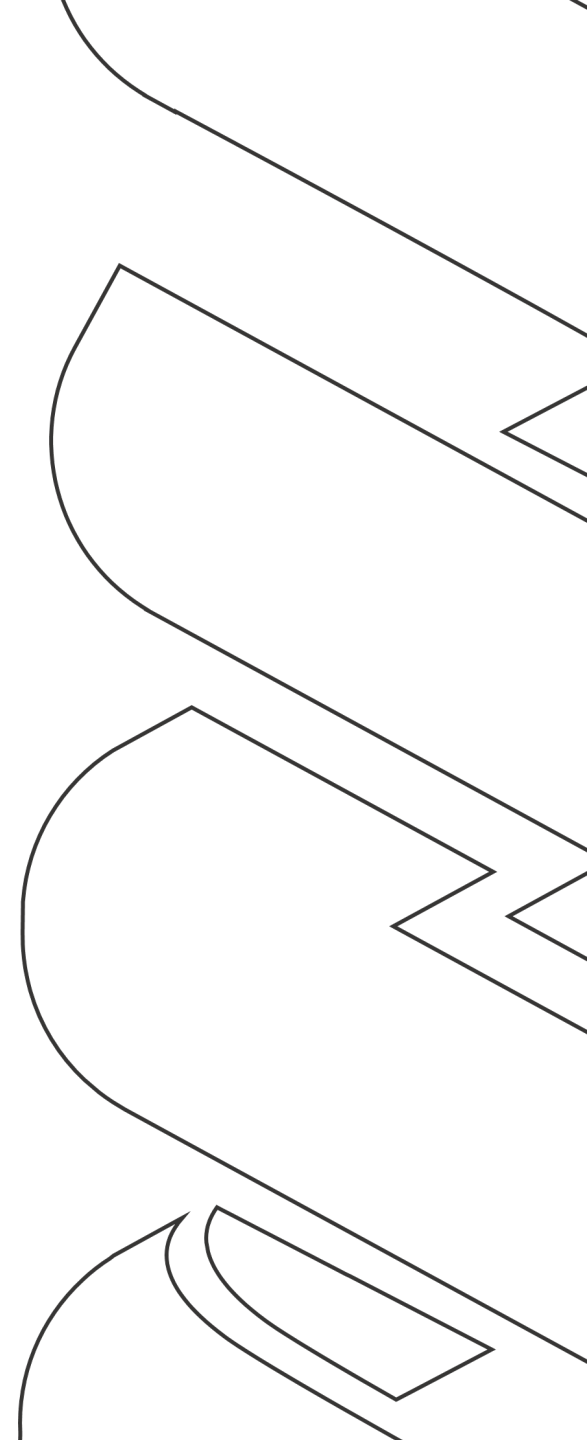


**Growth comes from known resources and amplitude supported prospects**



---

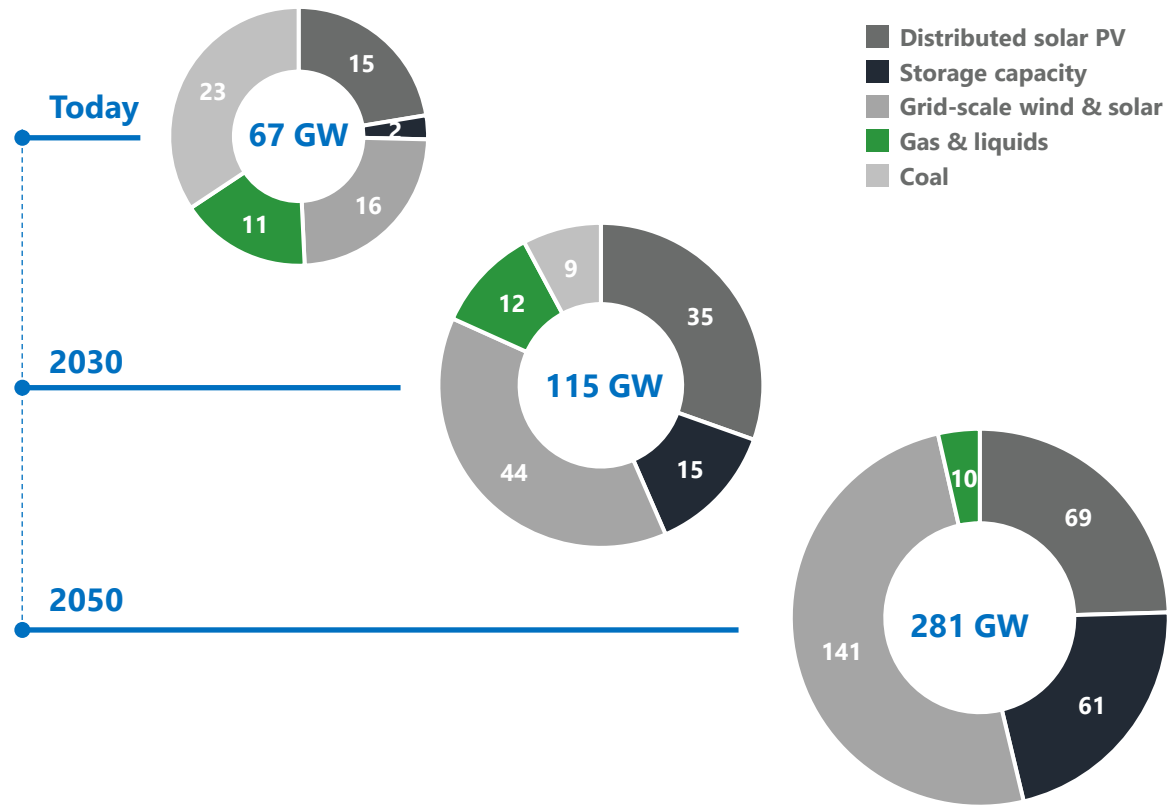
# Appendix



# AEMO data—2022 integrated system plan for the NEM

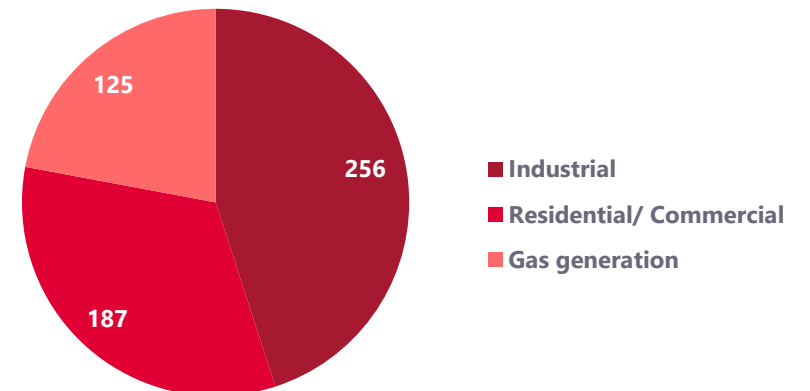
## Gas in the Australian East Coast energy mix

### Forecast changes in NEM generation (2022 ISP), GW



- NEM represents ~20% of total East Coast demand for gas in 2022<sup>1</sup>
  - AEMO data suggests 90-100 PJ<sup>2</sup> per annum of gas demand for electricity generation through to 2050
- ~260 TJ/d

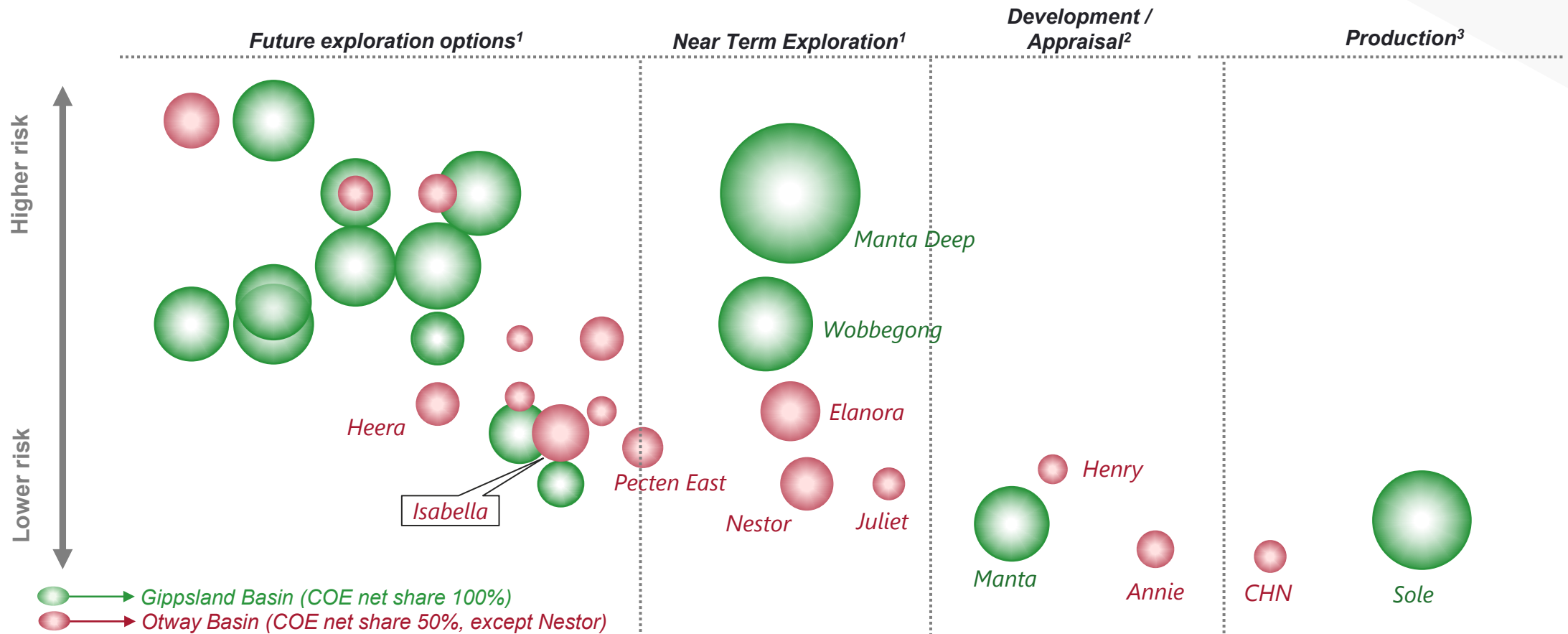
2022 East Coast Gas Demand (PJ)<sup>3</sup>



As the national electricity market grows, gas remains a key part of the energy mix thru to >2050

# Growth pathway: maturing a broad portfolio of opportunities

High graded exploration and appraisal prospects to feed Cooper Energy's twin gas hubs



Six lowest risk, amplitude supported Otway Basin prospects have unrisks mean resource potential of 325 Bcf

# Reserves and Contingent Resources at 30 June 2022

Summary, refer further to ASX announcement on 22 August 2022

Reserves <sup>1</sup>		1P (Proved)				2P (Proved & Probable)				3P (Proved, Probable & Possible)			
		Cooper	Otway	Gippsland	Total	Cooper	Otway	Gippsland	Total	Cooper	Otway	Gippsland	Total
<b>Developed</b>													
Sales gas	PJ	0.0	11.9	149.7	161.6	0.0	16.8	212.4	229.2	0.0	19.9	294.4	314.2
Oil and condensate	MMbbl	0.4	0.0	0.0	0.4	0.9	0.0	0.0	1.0	1.3	0.0	0.0	1.3
<b>Developed total</b>	<b>MMboe</b>	<b>0.4</b>	<b>1.9</b>	<b>24.5</b>	<b>26.9</b>	<b>0.9</b>	<b>2.8</b>	<b>34.7</b>	<b>38.4</b>	<b>1.3</b>	<b>3.3</b>	<b>48.1</b>	<b>52.6</b>
<b>Undeveloped</b>													
Sales gas	PJ	0.0	6.2	0.0	6.2	0.0	5.9	0.0	5.9	0.0	5.4	0.0	5.4
Oil and condensate	MMbbl	0.0	0.0	0.0	0.0	0.2	0.0	0.0	0.2	0.4	0.0	0.0	0.4
<b>Undeveloped total</b>	<b>MMboe</b>	<b>0.0</b>	<b>1.0</b>	<b>0.0</b>	<b>1.0</b>	<b>0.2</b>	<b>1.0</b>	<b>0.0</b>	<b>1.1</b>	<b>0.4</b>	<b>0.9</b>	<b>0.0</b>	<b>1.3</b>
<b>Total</b>	<b>MMboe</b>	<b>0.5</b>	<b>3.0</b>	<b>24.5</b>	<b>27.9</b>	<b>1.1</b>	<b>3.7</b>	<b>34.7</b>	<b>39.5</b>	<b>1.7</b>	<b>4.1</b>	<b>48.1</b>	<b>53.9</b>

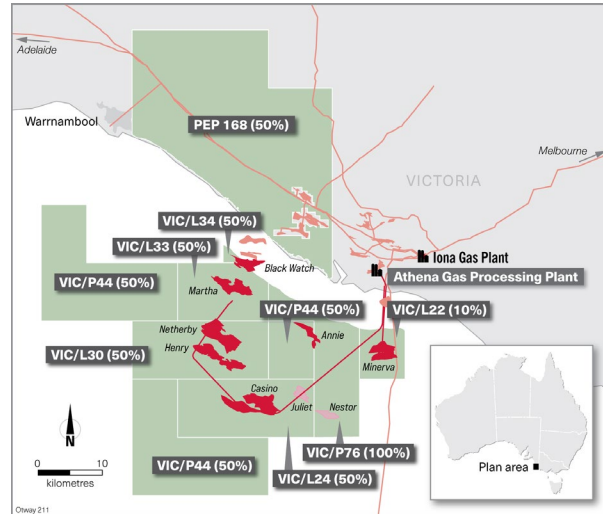
Contingent Resources <sup>1</sup>	1C			2C			3C		
	Gas	Oil and cond.	Total	Gas	Oil and cond.	Total	Gas	Oil and cond.	Total
	PJ	MMbbl	MMboe	PJ	MMbbl	MMboe	PJ	MMbbl	MMboe
Gippsland Basin	83.1	2.2	15.8	134.9	3.4	25.4	212.3	5.4	40.1
Otway Basin	47.0	0.03	7.7	66.9	0.1	11.0	87.3	0.1	14.4
Cooper Basin	0.0	0.2	0.2	0.0	0.4	0.4	0.0	0.8	0.8
<b>Total</b>	<b>130.0</b>	<b>2.4</b>	<b>23.7</b>	<b>201.8</b>	<b>3.9</b>	<b>36.9</b>	<b>299.6</b>	<b>6.3</b>	<b>55.3</b>



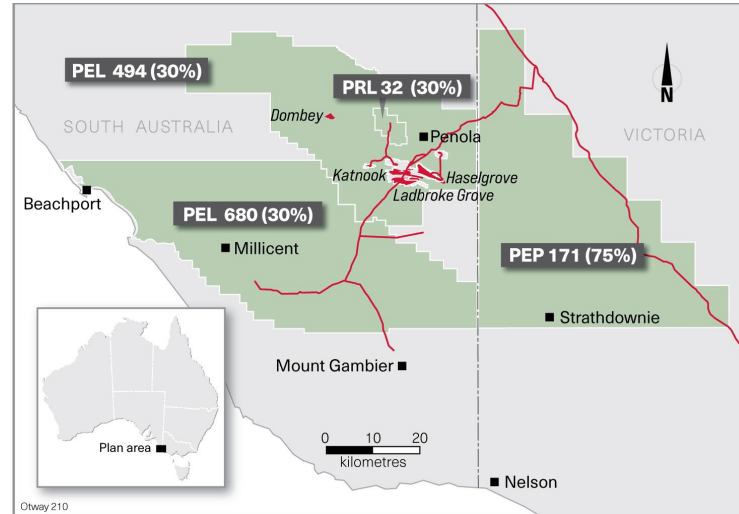
# Cooper Energy tenements<sup>1</sup>

## Summary

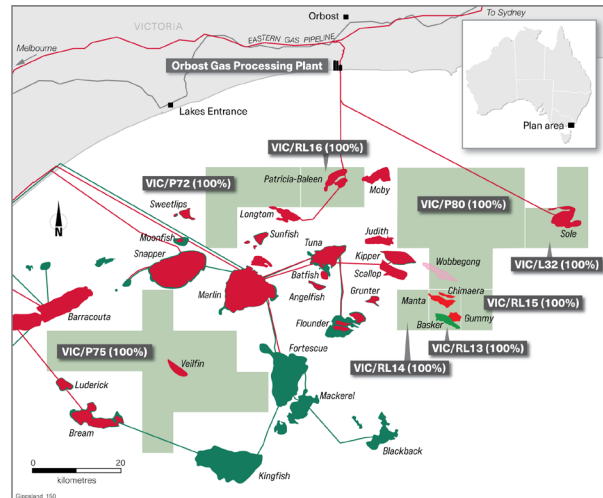
Otway Basin (Victoria and Offshore)



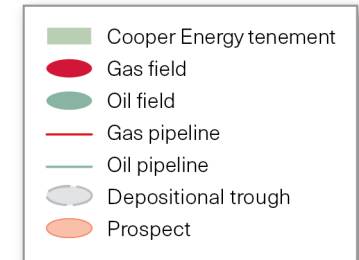
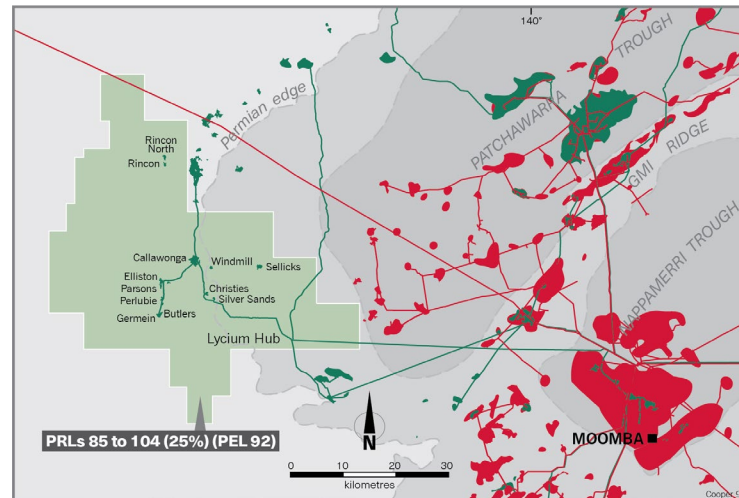
Otway Basin (Onshore South Australia and Victoria)



Gippsland Basin (Victoria)



Cooper Basin (South Australia)



# Footnotes

## By page

### Slide 4

1. Source: Cooper Energy analysis of January 2022 ACCC Gas Inquiry Report
2. Supply includes Cooper Basin, Otway Basin and Gippsland Basin. Demand includes VIC, NSW, SA, ACT and TAS
3. AEMO data
4. Source: ACCC short-term and medium-term LNG netback price series as at 1 September 2022. Victorian gas price includes transport cost of \$2.14/GJ to Culcairn quoted on APA Group website as at 15 September 2022

### Slide 5

1. opennem data

### Slide 7

1. Wood Mackenzie Upstream Australasia Insight Report (July 2021). Amounts shown here are Wood Mackenzie assessed commercial reserves (see slide 28 for Cooper Energy management's estimates of reserves). Wood Mackenzie Disclaimer: The data and information provided by Wood Mackenzie should not be interpreted as advice and you should not rely on it for any purpose. You may not copy or use this data and information except as expressly permitted by Wood Mackenzie in writing. To the fullest extent permitted by law, Wood Mackenzie accepts no responsibility for your use of this data and information except as specified in a written agreement you have entered into with Wood Mackenzie for the provision of such data and information

### Slide 8

1. 150 TJ/day represents the nameplate capacity, however additional capital expenditure would be required on the Athena Gas Plant in order to achieve this rate
2. 68 TJ/day represents the nameplate capacity, however additional capital expenditure would be required on the Orbest Gas Processing Plant in order to achieve this rate

### Slide 9

1. Annie 2C resource included as part of the Otway Basin 2C number in the FY22 Reserves and Contingent Resources ASX release on the 22nd August 2022
2. Prospective Resources of the unrisks volume estimated to be recoverable from the prospect attributable to the Cooper Energy joint venture interest. The estimated quantities of petroleum that may be potentially recovered by the application of future development project(s) relate to undiscovered accumulations
3. Mean Prospective Resource for the Otway prospects was announced to the ASX on 9 February 2022
4. Pg represents the estimated probability of finding moveable gas

### Slide 10

1. Eight of the 17 seismic amplitude targets were drilled on Cooper Energy acreage

### Slide 11

1. Contingent Resource for the Manta gas and liquids resource was announced to ASX on 12 August 2019
2. Prospective Resources of the unrisks volume estimated to be recoverable from the prospect attributable to the Cooper Energy joint venture interest. The estimated quantities of petroleum that may be potentially recovered by the application of future development project(s) relate to undiscovered accumulations
3. Pg represents the estimated probability of finding moveable gas
4. Prospective Resources for the Manta Deep and Chimaera East was announced to the ASX on 4 May 2016. PJ to Bcf conversion is 1.127
5. Prospective Resources for the Wobbegong prospect was announced to the ASX on 13 April 2022

### Slide 12

1. Production profiles are indicative and Cooper Energy share
2. Contingent Resource for the Manta gas and liquids resource was announced to ASX on 12 August 2019
3. Refer to Otway Basin Exploration Prospective Resource Update announced to the ASX on 9 February 2022. Production forecast assumes exploration success at Elanora, Juliet and Nestor prospects
4. Annie 2C resource included as part of the Otway Basin 2C number in the FY22 Reserves and Contingent Resources ASX release on the 22nd August 2022
5. Sole plus Casino, Henry and Netherby (CHN) as announced to the ASX on 22 August 2022

# Footnotes (cont'd)

## By page

### **Slide 14**

1. AEMO data
2. Assumes an average NEM-wide heat rate of ~8.6 GJ/MWh
3. Excluding gas that is used for LNG exports

### **Slide 15**

1. Bubble size of exploration prospects is based on unrisked mean recoverable resource estimate (Cooper Energy net share)
2. Bubble size of Henry, Manta and Annie bubble size is based on 2C Contingent Resources estimate (Cooper Energy net share) at 30 June 2022
3. Bubble size of Casino-Henry-Netherby (CHN) and Sole is based on 2P Reserves estimate (Cooper Energy net share) at 30 June 2022

### **Slide 16**

1. Reserves and contingent resources were announced to the ASX on 22 August 2022. Totals may not reflect arithmetic addition due to rounding. The method of aggregation is by arithmetic sum by category. As a result, the 1P and the 1C estimates may be conservative and the 3P and the 3C estimates may be optimistic, due to the effects of arithmetic summation. A conversion factor of 1 PJ = 0.163 million boe has been used to convert from sales gas (PJ) to oil equivalent (million boe). The reserves and contingent resources information displayed should be read in conjunction with the information provided in the notes on calculation of reserves and contingent resources provided elsewhere in this presentation

### **Slide 17**

1. Please refer to Cooper Energy's Annual Report for further information regarding tenement interests

# Notes on calculation of Reserves and Contingent Resources

## PRMS

Cooper Energy prepares its petroleum Reserves and Contingent Resources in accordance with the definitions and guidelines in the Society of Petroleum Engineers (SPE) 2018 Petroleum Resources Management System (PRMS).

The estimates of petroleum Reserves and Contingent Resources contained in this Reserves statement are as at 30 June 2022. The Company is not aware of any new information or data that materially affects the estimates of reserves and contingent resources, and the material assumptions and technical parameters underpinning the estimates continue to apply and have not materially changed.

Unless otherwise stated, all references to Reserves and Contingent Resources quantities in this document are Cooper Energy's net share.

Cooper Energy has completed its own estimation of Reserves and Contingent Resources for its operated Otway and Gippsland Basin assets. Elsewhere, Reserves and Contingent Resources estimation is based on assessment and independent views of information provided by the permit operators (Beach Energy Limited for PEL 92).

Reference points for Cooper Energy's petroleum Reserves and Contingent Resources and production are defined points where normal operations cease, and petroleum products are measured under defined conditions prior to custody transfer. Fuel, flare and vent consumed prior to the reference point is excluded.

Petroleum Reserves and Contingent Resources are prepared using deterministic, with support from probabilistic methods. The Reserves and Contingent Resources estimate methodologies incorporate a range of uncertainty relating to each of the key reservoir input parameters to predict the likely range of outcomes.

Project and field totals are aggregated by arithmetic summation by category. Aggregated 1P and 1C estimates may be conservative and aggregated 3P and 3C estimates may be optimistic due to the effects of arithmetic summation.

Throughout this presentation, totals may not exactly reflect arithmetic addition due to rounding.

The conversion factor of 1 PJ = 0.163 MMboe has been used to convert from sales gas (PJ) to oil equivalent (MMboe).

### **Reserves**

Under the SPE PRMS 2018, "Reserves are those quantities of petroleum anticipated to be commercially recoverable by application of development projects to known accumulations from a given date forward under defined conditions".

The Otway Basin totals comprise the arithmetically aggregated project fields (Casino, Henry and Netherby). The Cooper Basin totals comprise the arithmetically aggregated PEL 92 fields. The Gippsland Basin totals comprise Sole Reserves only.

### **Contingent Resources**

Under the SPE PRMS 2018, "Contingent Resources are those quantities of petroleum estimated, as of a given date, to be potentially recoverable from known accumulations by application of development projects, but which are not currently considered to be commercially recoverable owing to one or more contingencies".

The Contingent Resources assessment includes resources in the Gippsland, Otway and Cooper Basins.

### **Qualified petroleum Reserves and resources evaluator statement**

The information contained in this report regarding Cooper Energy's Reserves and Contingent Resources is based on, and fairly represents, information and supporting documentation prepared by, or under the supervision of, Mr Andrew Thomas who is a full-time employee of Cooper Energy Limited holding the position of General Manager – Exploration & Subsurface. Mr Thomas holds a Bachelor of Science (Hons), is a member of the American Association of Petroleum Geologists and the Society of Petroleum Engineers, is qualified in accordance with ASX listing rule 5.41, and has consented to the inclusion of this information in the form and context in which it appears.