Appendix 40: Origin Energy Directors' Report for the Year ended 30 June 2020 (including the Operating and Financial Review and the Remuneration Report)

DIRECTORS' REPORT

For the year ended 30 June 2020

(including the Operating Financial Review and the Remuneration Report)

20 August 2020

In accordance with the Corporations Act 2001 (Cth), the Directors of Origin Energy Limited (Company) report on the Company and the consolidated entity Origin Energy Group (Origin), being the Company and its controlled entities for the year ended 30 June 2020.

The Operating and Financial Review and Remuneration Report form part of this Directors' Report.

1. Principal activities, review of operations and significant change in state of affairs

During the year, the principal activity of Origin was the operation of energy businesses including exploration and production of natural gas, electricity generation, wholesale and retail sale of electricity and gas, and sale of liquefied natural gas. There have been no significant changes in the nature of those activities during the year and no significant changes in the state of affairs of the Company during the year.

The Operating and Financial Review, which forms part of this Directors' Report, contains a review of operations during the year and the results of those operations, the financial position of Origin, its business strategies, and prospects for future financial years.

2. Events subsequent to balance date

Other than the matters described below, no matters or circumstances have arisen since 30 June 2020, which have significantly affected, or may significantly affect the Company's operations, the results of those operations or the Company's state of affairs in future financial years.

On 2 July 2020, the Group extended $1.1 billion of bank debt facilities from a FY2023 maturity date to a new maturity date in FY2025. A further $0.2 billion of surplus liquidity was cancelled as part of this transaction.

On 20 August 2020 the Directors determined a final dividend of 10 cents per share, unfranked, on ordinary shares. The dividend will be paid on 2 October 2020.

3. Dividends

a) Dividends paid during the year by the Company were as follows

	$ million
15 cents per ordinary share, fully franked, for the half year ended 31 December 2019, paid 27 March 2020	264

b) In respect of the current financial year, the Directors have determined a final dividend as follows:

	$ million
10 cents per ordinary share, unfranked, for the year ended 30 June 2020, payable 2 October 2020.	176

The Dividend Reinvestment Plan (DRP) will apply to this final dividend at no discount.

4. Directors and Company Secretary

The Directors of the Company at any time during or since the end of the financial year, their qualifications, experience and special responsibilities are set out below. The qualifications and experience of the Company Secretary is also set out below:

Gordon Cairns
Independent Non-executive Chairman
Tenure 13 years, 2 months

Gordon Cairns joined the Board in June 2007 and became Chairman in October 2013. He is Chairman of the Nomination Committee and a member of the Audit, Health, Safety and Environment, Risk and Remuneration and People committees.

Gordon has extensive Australian and international experience as a senior executive, as Chief Executive Officer of Lion Nathan Ltd, and has held senior management positions in marketing, operations and finance with PepsiCo, Cadbury Ltd and Nestlé.

Gordon is Chairman of Woolworths Group Limited (since September 2015), a Non-executive Director of Macquarie Group Limited and Macquarie Bank Limited (since November 2014) and World Education Australia (since November 2007).

Gordon was previously Chairman of the Origin Foundation, David Jones Limited (March 2014 - August 2014) and Rebel Group (2010 - 2012), Director of The Centre for Independent Studies (May 2006 - August 2011), Quick Service Restaurant Group (October 2011 – May 2017) and Westpac Banking Corporation (July 2004 - December 2013). He was also a senior advisor to McKinsey & Company.

Gordon holds a Master of Arts (Honours) from the University of Edinburgh.

John Akehurst
Independent Non-executive Director
Tenure 11 years, 4 months

John Akehurst joined the Board in April 2009. He is Chairman of the Health, Safety and Environment Committee and a member of the Nomination and Risk committees.

John's executive career was in the upstream oil and gas and LNG industries, initially with Royal Dutch Shell and then as Chief Executive Officer of Woodside Petroleum Limited.

John is a Director of Human Nature Adventure Therapy Ltd (since February 2018).

John was previously Chairman of the National Centre for Asbestos Related Diseases (2009 - April 2020), the Fortitude Foundation (2007 - April 2020), Transform Exploration Pty Ltd (February 2012 – December 2017), Alinta Limited (January 2007 - September 2007) and Coogee Resources Ltd (2008 - 2009) and a former Board member of the Reserve Bank of Australia (September 2007 – September 2017), Director of CSL Limited (April 2004 - October 2016), Oil Search Limited (1998-2003), Securency Ltd (2008 - 2012), Murdoch Film Studios Pty Ltd and the University of Western Australia Business School.

John holds a Masters in Engineering Science from Oxford University and is a Fellow of the Institution of Mechanical Engineers.

Maxine Brenner
Independent Non-executive Director
Tenure 6 years, 9 months

Maxine Brenner joined the Board in November 2013. She is Chairman of the Risk Committee and a member of the Audit and Nomination committees.

Maxine was previously a Managing Director of Investment Banking at Investec Bank (Australia) Ltd. Prior to Investec, Maxine was a Lecturer in Law at the University of NSW and a lawyer at Freehills, specialising in corporate law.

Maxine is a Non-executive Director and Chairman of the Remuneration Committee of Orica Ltd (since April 2013) and Qantas Airways Ltd (since August 2013). She is also an Independent Director and Chairman of the Audit and Risk Committee for Growthpoint Properties Australia and a member of the University of NSW Council.

Maxine's former directorships include Treasury Corporation of NSW, Bulmer Australia Ltd, Neverfail Springwater Ltd (1999 - 2003) and Federal Airports Corporation, where she was Deputy Chair. In addition, Maxine has served as a Council Member of the State Library of NSW and as a member of the Takeovers Panel.

Maxine holds a Bachelor of Arts and a Bachelor of Laws.

Frank Calabria
Managing Director & Chief Executive Officer
Tenure 3 years, 10 months

Frank Calabria was appointed Managing Director & Chief Executive Officer in October 2016. Frank is a member of the Health, Safety and Environment Committee and a Director of the Origin Foundation.

Frank first joined Origin as Chief Financial Officer in November 2001 and was appointed Chief Executive Officer, Energy Markets in March 2009. In that latter role, Frank was responsible for the integrated business within Australia including retailing and trading of natural gas, electricity and LPG, power generation and solar and energy services.

Frank is a Director of the Australian Energy Council and the Australian Petroleum Production & Exploration Association. He is a former Chairman of the Australian Energy Council and former Director of the Australian Energy Market Operator.

Frank has a Bachelor of Economics from Macquarie University and a Master of Business Administration (Executive) from the Australian Graduate School of Management. Frank is also a Fellow of the Chartered Accountants Australia and New Zealand and a Fellow of the Financial Services Institute of Australasia.

Teresa Engelhard
Independent Non-executive Director
Tenure 3 years, 3 months

Teresa Engelhard joined the Board in May 2017. She is a member of the Audit, Health, Safety and Environment and Remuneration and People committees.

Teresa has more than 20 years' experience in the information, communication, technology and energy sectors as a senior executive and venture capitalist.

Teresa is a Non-executive Director of Wisetech Global (since March 2018), StartupAUS (since March 2016), and LaunchVic (since July 2020). Teresa started her career at McKinsey & Company in California where she served energy and retail clients. More recently, she focused on energy sector innovation as a Managing Partner at Jolimont Capital.

Teresa's former directorships include Daintree Networks, Planet Innovation Ltd (April 2016 – November 2019) and RedBubble Limited (July 2011 - October 2017).

Teresa holds a Bachelor of Science (Hons) degree from the California Institute of Technology (Caltech), an MBA from Stanford University and is a graduate of the Australian Institute of Company Directors.

Greg Lalicker
Independent Non-executive Director
Tenure 1 year, 5 months

Greg Lalicker joined the Board in March 2019.

Greg is the Chief Executive Officer of Hilcorp Energy Company, based in Houston, USA. Hilcorp is the largest privately held independent oil and gas exploration and production company in the United States.

Greg joined Hilcorp's leadership team in 2006 as Executive Vice President where he was responsible for all exploration and production activities. He was appointed President in 2011 and Chief Executive Officer in 2018. Prior to working for Hilcorp, Greg was with BHP Petroleum based in Midland, Houston, London and Melbourne as well as McKinsey & Company where he worked in its Houston, Abu Dhabi and London offices.

Greg graduated as a petroleum engineer from the University of Tulsa. He also has a Master of Business Administration and a law degree.

Bruce Morgan
Independent Non-executive Director
Tenure 7 years, 9 months

Bruce Morgan joined the Board in November 2012. He is Chairman of the Audit Committee and a member of the Health, Safety and Environment, Nomination and Risk committees.

Bruce is Chairman of Transport Asset Holding Entity of New South Wales (since July 2020), Sydney Water Corporation (since October 2013), a Director of Redkite, the University of NSW Foundation and Deputy Chair of the European Australian Business Council.

Bruce served as Chairman of the Board of PricewaterhouseCoopers (PwC) Australia between 2005 and 2012. In 2009, he was elected as a member of the PwC International Board, serving a four-year term. He was previously a Director of Caltex Australia Ltd (2013 to May 2020) and Managing Partner of PwC's Sydney and Brisbane offices. An audit partner of the firm for over 25 years, he was focused on the financial services and energy and mining sectors leading some of the firm's most significant clients in Australia and internationally.

Bruce has a Bachelor of Commerce (Accounting and Finance) from the University of NSW and is an adjunct Professor of the University. Bruce is a Fellow of the Chartered Accountants Australia and New Zealand and of the Australian Institute of Company Directors.

Scott Perkins
Independent Non-executive Director
Tenure 4 years, 11 months

Scott Perkins joined the Board in September 2015. He is a member of the Audit, Health, Safety and Environment, Nomination, Remuneration and People and Risk committees.

Scott has extensive Australian and international experience as a leading corporate adviser. He was formerly Head of Corporate Finance for Deutsche Bank Australia and New Zealand and a member of the Executive Committee with overall responsibility for the Bank's activities in this region. Prior to that he was Chief Executive Officer of Deutsche Bank New Zealand and Deputy CEO of Bankers Trust New Zealand.

Scott is a Non-executive Director of Woolworths Limited (since September 2014) and Brambles Limited (since May 2015). He is Chairman of Sweet Louise (since 2005) and the New Zealand Initiative (since 2012). Scott was previously a Director of the Museum of Contemporary Art in Sydney (2011 - 2020) and a Non-executive Director of Meridian Energy (1999 - 2002).

Scott has a longstanding commitment to breast cancer causes, the visual arts and public policy development.

Scott holds a Bachelor of Commerce and a Bachelor of Laws (Hons) from Auckland University.

Steven Sargent
Independent Non-executive Director
Tenure 5 years, 3 months

Steven Sargent joined the Board in May 2015. He is Chairman of the Origin Foundation, Chairman of the Remuneration and People Committee and a member of the Health, Safety and Environment, Risk and Nomination committees.

Steven's executive career included 22 years at General Electric, where he led businesses across the USA, Europe and Asia Pacific. Steven was President and CEO of GE Mining, GE's global mining technology and services business. Prior to this he was President and CEO of GE Australia, NZ & PNG where he had local responsibility for GE's Energy, Oil and Gas, Aviation, Healthcare and Financial Services businesses.

Steven is Chairman of OFX Group Ltd (since November 2016) and Deputy Chairman of Nanosonics Ltd (since July 2016). Over recent years Steven has been a Non-executive Director of Veda Group Ltd (2015 - 2016).

Steven holds a Bachelor of Business from Charles Sturt University and is a Fellow with the Australian Institute of Company Directors and a Fellow with the Australian Academy of Technological Sciences and Engineering.

Helen Hardy
Company Secretary

Helen Hardy joined Origin in March 2010. She was previously General Manager, Company Secretariat of a large ASX listed company, and has advised on governance, financial reporting and corporate law at PwC and Freehills. Helen is a Chartered Accountant, Chartered Secretary and a Graduate Member of the Australian Institute of Company Directors. Helen is a fellow of the Governance Institute of Australia and is the Chair of its NSW Council and a member of its Legislative Review Committee and Communication Committee. She holds a Bachelor of Laws and a Bachelor of Commerce from the University of Melbourne, a Graduate Diploma in Applied Corporate Governance and is admitted to legal practice in New South Wales and Victoria.

5. Directors' meetings

The number of Directors' meetings, including Board committee meetings, and the number of meetings attended by each Director during the financial year are shown in the table below:

Directors	Board Meetings				Committee Meetings									
	Scheduled		Additional		Audit		Health, Safety and Environment (HSE)		Nomination		Remuneration & People		Risk	
	H	A	H	A	H	A	H	A	H	A	H	A	H	A
J Akehurst	10	10	3	3	-	-	5	5	3	3	-	-	5	5
M Brenner	10	10	3	3	4	4	-	-	3	3	-	-	5	5
G Cairns	10	10	3	3	4	4	5	5	3	3	5	5	5	5
F Calabria	10	10	3	3	-	-	5	5	-	-	-	-	-	-
T Engelhard	10	10	3	3	4	4	2	2	-	-	5	5	-	-
G Lalicker	10	10	3	3	-	-	-	-	-	-	-	-	-	-
B Morgan	10	10	3	3	4	4	5	5	3	3	-	-	5	5
S Perkins	10	10	3	3	4	4	2	2	3	3	5	5	5	5
S Sargent	10	10	3	3	-	-	5	5	-	-	5	5	2	2

H Number of scheduled meetings held during the time that the Director held office or was a member of the committee during the year.
A Number of meetings attended.

The Board held ten scheduled meetings, including a one-day strategic review meeting and three additional meetings to deal with urgent matters. There were also four Board or Committee workshops to consider matters of particular relevance. In addition, the Board conducted visits of Company operations at various sites and met with operational management during the year.

6. Directors' interests in shares, Options and Rights

The relevant interests of each Director as at 30 June 2020 in the shares and Options or Rights over such instruments issued by the companies within the consolidated entity and other related bodies corporate at the date of this report are as follows:

Director	Ordinary shares held directly and indirectly	Options over ordinary shares	Deferred Share Rights (DSR) over ordinary Shares	Performance Share Rights (PSR) over ordinary shares	Restricted Shares
G Cairns	163,660	-	-	-	-
F Calabria	187,340	632,995[1]	110,779[2]	958,872[2]	249,926[2]
J Akehurst	71,200	-	-	-	-
M Brenner	28,367	-	-	-	-
T Engelhard	34,421	-	-	-	-
G Lalicker	100,000	-	-	-	-
B Morgan	47,143	-	-	-	-
S Sargent	31,429	-	-	-	-
S Perkins	30,000	-	-	-	-

Exercise price for Options and Rights:
(1) 231,707: \$5.67; 401,288: \$7.37.
(2) Nil.

No Director other than the Managing Director & Chief Executive Officer participates in the Company's Equity Incentive Plan.

Securities granted by Origin

Non-executive Directors do not receive Options or Rights as part of their remuneration. The following securities were granted to the 5 most highly remunerated officers (other than Directors) of the Company during the year ended 30 June 2020:

	PSRs	Restricted Shares
J Briskin	125,762	46,689
G Jarvis	134,146	164,370
M Schubert	134,146	52,275
L Tremaine	167,682	95,090
A Lucas	119,055	53,035

Each of these awards was made in accordance with the Company's Equity Incentive Plan as part of the relevant executive's remuneration. Further details on Options and Rights granted during the financial year, and unissued shares under Options and Rights, are included in Section 7 of the Remuneration Report.

No Options or Rights were granted since the end of the financial year.

Origin Shares issued on the exercise of Options and Rights

Options

No Options granted under the Equity Incentive Plan were exercised during or since the year ended 30 June 2020, so no ordinary shares in Origin were issued as a result.

Rights

1,705,133 ordinary shares of Origin were allocated from the Origin Energy Limited Employee Share Trust during the year ended 30 June 2020 on the vesting and exercise of DSRs granted under the Equity Incentive Plan. No amounts were payable on the vesting of those DSRs and, accordingly, no amounts remain unpaid in respect of any of those shares.

Since 30 June 2020, 76,202 ordinary shares were allocated from the Origin Energy Limited Employee Share Trust on the vesting of DSRs granted under the Equity Incentive Plan.

All shares in the Origin Energy Limited Employee Share Trust were purchased on market.

7. Environmental regulation and performance

The Company's operations are subject to environmental regulation under Commonwealth, State, and Territory legislation. For the year ended 30 June 2020, regulators were notified of a total of 31 environmental reportable non-compliances, including voluntary notifications. Of these, two incidents resulted in environmental impacts with a moderate short-term impact to the environment. All other environmental incidents had a minor consequence and were appropriately investigated. In FY2020, the Company received two formal environmental notices from a regulator arising from Origin's activities. One of these notices resulted in a $15,000 fine for an infringement at the Eraring Power Station within the Energy Markets Generation business. The other notice related to a $431 fine for a late submission of an annual return. Remedial actions have been taken or are being undertaken in response to the incidents and notices. All incidents are investigated, and lessons learned captured and shared across the Company.

Our Integrated Gas business is currently being investigated by the Department of Environment and Science for a coal seam gas residue release at our Ramyard and Woleebee sites in early 2020. Clean up notices were issued in FY21 but there have been no enforcement actions issued at the time of this Report. Origin is currently working with the regulator on the remediation activities.

8. Indemnities and insurance for Directors and Officers

Under its Constitution, the Company may indemnify current and past Directors and Officers for losses or liabilities incurred by them as a Director or Officer of the Company or its related bodies corporate to the extent allowed under law. The Constitution also permits the Company to purchase and maintain a Directors' and Officers' insurance policy. No indemnity has been granted to an auditor of the Company in their capacity as auditor of the Company.

The Company has entered into agreements with current Directors and certain former Directors whereby it will indemnify those Directors from all losses or liabilities in accordance with the terms of, and subject to the limits set by, the Constitution.

The agreements stipulate that the Company will meet the full amount of any such liability, including costs and expenses to the extent allowed under law. The Company is not aware of any liability having arisen, and no claim has been made against the Company during or since the year ended 30 June 2019 under these agreements.

During the year, the Company has paid insurance premiums in respect of Directors' and Officers' liability, and legal expense insurance contracts for the year ended 30 June 2020.

The insurance contracts insure against certain liability (subject to exclusions) of persons who are or have been Directors or Officers of the Company and its controlled entities. A condition of the contracts is that the nature of the liability indemnified and the premium payable not be disclosed.

9. Auditor independence

There is no former partner or director of EY, the Company's auditors, who is or was at any time during the year ended 30 June 2020 an officer of the Origin Energy Group. The auditor's independence declaration for the financial year (made under section 307C of the Corporations Act (Cth)) is attached to and forms part of this Report.

10. Non-audit services

The amounts paid or payable to EY for non-audit services provided during the year was $1,075,000 (shown to nearest thousand dollar). Amounts paid to EY are included in G7 to the full financial statements.

Based on written advice received from the Audit Committee Chairman pursuant to a resolution passed by the Audit Committee, the Board has formed the view that the provision of those non-audit services by EY is compatible with, and did not compromise, the general standards of independence for auditors imposed by the Corporations Act 2001 (Cth). The Board's reasons for concluding that the non-audit services provided by EY did not compromise its independence are:

- all non-audit services provided were subjected to the Company's corporate governance procedures and were either below the pre-approved limits imposed by the Audit Committee or separately approved by the Audit Committee;
- all non-audit services provided did not, and do not, undermine the general principles relating to auditor independence as they did not involve reviewing or auditing the auditor's own work, acting in a management or decision making capacity for the Company, acting as an advocate for the Company or jointly sharing risks and rewards; and
- there were no known conflict of interest situations nor any other circumstance arising out of a relationship between Origin (including its Directors and officers) and EY which may impact on auditor independence.

11. Proceedings on behalf of the Company

The Company is not aware of any proceedings being brought on behalf of the Company, nor any applications having been made in respect of the Company under section 237 of the Corporations Act 2001 (Cth).

12. Rounding of amounts

The Company is of a kind referred to in ASIC Corporations (Rounding in Financial/Directors' Reports) Instrument 2016/191 dated 24 March 2016 and in accordance with that class order, amounts in the financial report and Directors' Report have been rounded off to the nearest million dollars unless otherwise stated.

13. Remuneration

The Remuneration Report forms part of this Directors' Report.

This report is attached to and forms part of the Directors' Report.

Operating and Financial Review

Year ended 30 June 2020

Table of contents

1. Our purpose underpins everything we do

Our purpose: *Getting energy right for our customers, communities & planet*

Getting energy right for our customers

Our customers are at the heart of everything we do. We are committed to providing 'good energy' that is reliable, affordable and sustainable. In FY2020, we:

- responded to the COVID-19 pandemic with a commitment to not disconnect or default list residential or small business customers in financial distress until at least 31 October 2020;
- extended regulated retail pricing to our customers beyond regulatory requirements;
- supported customers experiencing financial hardship, with 33,100 successfully completing our Power On hardship program;
- continued to support local businesses with supply from new APLNG acreage dedicated to large manufacturing customers;
- improved our Strategic Net Promoter Score (NPS) by eight points to +2 as at 30 June 2020, increasing further to +5 as at July 2020;
- continued to support customer take-up of renewable energy, as one of Australia's leading installers of rooftop solar and providers of GreenPower and Green Gas; and
- leveraged our global energy accelerator program, Free Electrons to partner with start-ups, including OhmConnect and Orison to roll out solutions in demand-side management and storage.

Getting energy right for our communities

We respect the rights and interests of the communities in which we operate, and consult with them to understand and manage our impact.

The Origin Energy Foundation is celebrating its 10th anniversary in 2020. Through grants, volunteering and workplace giving programs, the Foundation contributed more than $2.9 million to the community in FY2020.

Origin and its employees donated more than $870,000 to support communities affected by bushfires and drought. This included $300,000 given to the Australian Red Cross and state-based rural fire services, and $100,000 to Drought Angels.

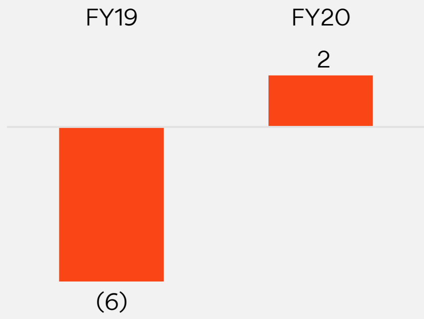
We spent $365 million directly with regional suppliers, or 14 per cent of our total spend.

We launched our Stretch Reconciliation Action Plan (RAP) in July 2019 to show our commitment to participating in Australia's reconciliation efforts through targeted activities across learning, procurement and employment. In FY2020, we spent $5.3 million with Indigenous suppliers, exceeding our Stretch RAP target of $5 million.

This year, we announced our new three-year community partnership with Netball Australia, supporting players at all levels across the country – from local clubs to the Australian Diamonds.

We continue to work closely with the Northern Land Council to engage with and maintain the support of our host Traditional Owners, who are the Native Title holders where we work in the Beetaloo Basin.

Strategic NPS



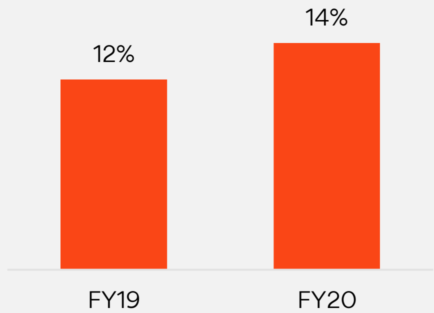
33,100

Customers successfully completed our Power On hardship program

>$2.9 million

contributed to the community by the Origin Energy Foundation

Regional procurement spend as a % of total spend



Getting energy right for the planet

We unequivocally support the Paris Agreement to limit the world's temperature rise to well below 2°C above pre-industrial levels and pursue efforts to further limit this increase to 1.5°C.

In line with our decarbonisation strategy, we are:

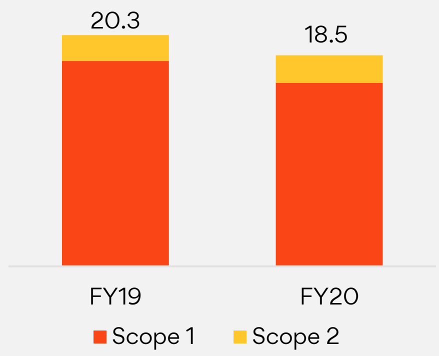
- committed to lowering Scope 1 and 2 emissions by 50 per cent and Scope 3 emissions by 25 per cent by 2032, approved by the Science Based Targets initiative;
- targeting more than 25 per cent of owned and contracted generation capacity from renewables and storage by the end of 2020, subject to development and commissioning timelines;
- setting a new target to reduce Scope 1 emissions by 10 per cent on average over FY2021-23 from a FY2017 baseline;
- including a new climate change target linked to executive remuneration; and
- planning to update our existing science-based target to a 1.5°C pathway with an aim to achieve net zero emissions by 2050.

During FY2020, we:

- reduced our operational Scope 1 and 2 emissions by 1.8 million tonnes, or 9 per cent;
- increased solar installations to 61 MW, up from 50 MW in FY2019; and
- published updated scenario analysis evaluating the impact of a 1.5°C carbon reduction pathway on our wholesale and generation portfolio.

Our disclosures under the Task Force on Climate-related Financial Disclosure guidelines are set out in our Sustainability Report.

Greenhouse Gas Emissions (mt CO2-e)



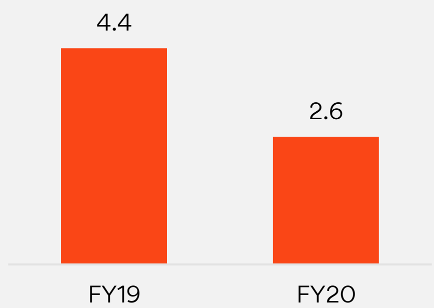
61 MW

Solar installations, up from 50 MW in FY2019

75%

Staff engagement, our highest ever score

Total Recordable Injury Frequency Rate (TRIFR)



Our people

Our people are one of our greatest strengths. Having a diverse and inclusive workplace, is key to creating a culture where people thrive, contributing to the success of our business.

During FY2020, we:

- increased our engagement score from 61 per cent to 75 per cent, placing Origin in the top quartile across Australia and New Zealand;
- Improved our TRIFR score from 4.4 to 2.6; and
- were ranked number nine globally in Equileap's 2019 Gender Equality Global Report & Ranking.

During the year, we also enhanced the learning and development options available to our people by launching our Learning and Development Hub.

We partnered with a new Employee Assistance Provider to give our people access to free, confidential, independent and professional support. We also launched an online Mental Health and Wellbeing Hub, which provides regular webinars, factsheets, videos, mindfulness exercises and support information.

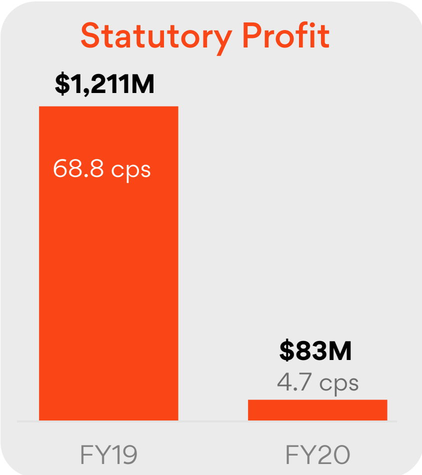
We also recently launched Gender Affirming Support@Origin and a new gender affirming leave policy.

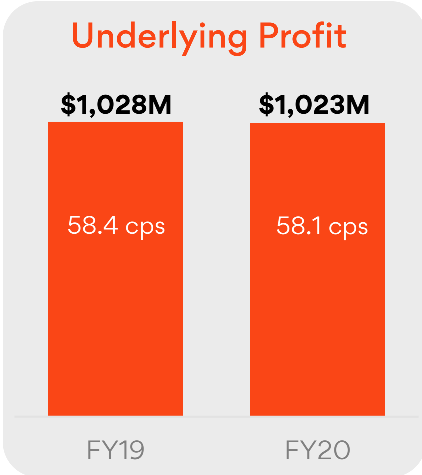
COVID-19 response

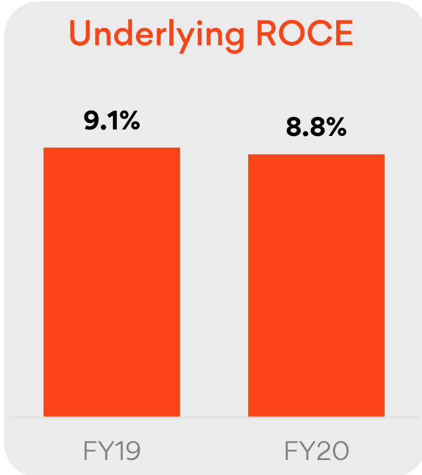
In response to the COVID-19 pandemic, we focused on the health and safety of our people and the communities in which we operate by maintaining a reliable supply of energy and supporting customers in need. We swiftly transitioned most of our people to working from home, with only people in critical roles remaining at sites, under strict health and safety measures. Our supply chains and operations adapted seamlessly without significant disruptions.

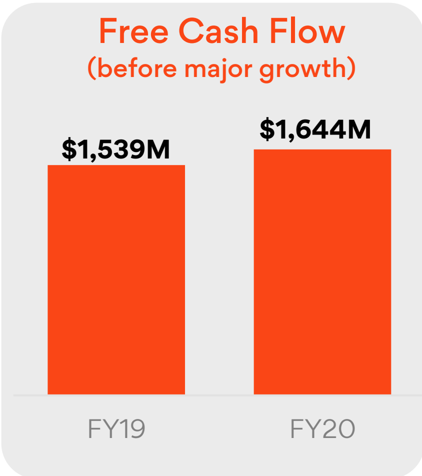
2. Highlights

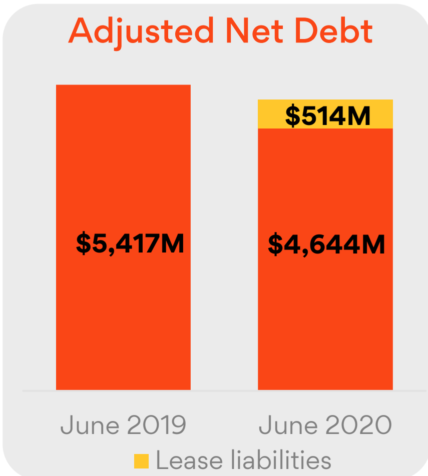
Financial performance











Final Dividend

10 cps

Unfranked

25 cps total FY2020 dividend (27% of FY2020 Free Cash Flow)

In FY2020, Origin delivered a strong operational and underlying financial result with increased Free Cash Flow underpinning continued debt reduction and disciplined investment in future growth.

Underlying Profit was in line with the prior year at $1,023 million, reflecting a stable result from APLNG but a lower contribution from Energy Markets, offset by lower commodity hedging costs in Integrated Gas, lower interest expense and the prior year non-cash remediation provision not repeating. Statutory Profit reduced, driven by non-cash APLNG impairment and onerous contract provision charges that totalled $1.2 billion, reflecting lower oil and LNG price assumptions.

Strong Free Cash Flow was driven by record cash distributions from APLNG of $1,275 million and proceeds from the sale of Ironbark of $231 million. This was partially offset by higher Energy Markets working capital and higher tax paid.

Adjusted Net Debt was down $773 million excluding the impact of lease liabilities under AASB 16 *Leases*. Adjusted Net Debt/Adjusted Underlying EBITDA reduced from 2.6x at June 2019 to 2.1x, the lower end of our 2.0-3.0x target range.

COVID-19 impacted the business in the final quarter of FY2020, primarily through lower commodity prices and lower electricity and gas demand from small and large business customers, partly offset by a moderate increase in retail demand. APLNG Q4 production reduced due to lower demand, and activity was paused in the Beetaloo Basin. Due to lagged contract pricing, reduced oil prices in the final quarter are expected to affect APLNG revenue in FY2021.

We continued to adopt a disciplined approach to capital management to maintain resilience and maximise returns. In response to the COVID-19 pandemic and a material reduction in commodity prices, we announced a number of cost reduction initiatives across both businesses. On 1 May 2020, we announced a strategic partnership with Octopus Energy, a fast-growing UK retailer, to radically transform our retail operations.

Energy Markets performance

Underlying EBITDA	Operating cash flow	Underlying ROCE
$1,459M	**$1,307M**	**10.2%**
Down $115m or 7% vs FY2019	Down $400m vs FY2019 due to working capital movements	Down 2% vs FY2019
Cost to serve	**Electricity and gas customer accounts**	**Strategic Net Promoter Score**
$570M	**3,851k**	**+2**
Down $40m ($58m after adjusting for AASB 16 *Leases* and COVID-19)	Up 21k vs June 2019	Up 8 points vs FY2019

Energy Markets Underlying EBITDA reduced in FY2020 as higher gas Gross Profit and savings in cost to serve were more than offset by lower electricity Gross Profit. Lower electricity Gross Profit was driven by the introduction of retail price regulations and lower volumes due to weather, solar uptake and energy efficiency, and the impact of COVID-19.

Operating cash flow was lower due to higher working capital, reflecting the timing of collateral deposited with the futures exchange associated with forward electricity hedge positions as part of our electricity risk management.

Despite the challenges posed during FY2020 by bushfires, extreme weather events and the COVID-19 pandemic, our power stations continued to supply the market as needed. We successfully returned a Mortlake unit to service ahead of the summer peak demand period and reduced our output in response to lower demand associated with COVID-19.

Construction of the 530 MW Stockyard Hill Wind Farm progressed and is targeted by the developer to come online by the end of 2020, subject to development and commissioning timelines. We continue to explore generation expansion opportunities, including grid-scale storage and fast-start gas. While forward wholesale electricity prices are currently below the price needed for investment, our longer-term view remains that as coal generation progressively exits, new firm and flexible generation capacity will be required to complement increasing renewable generation.

Retail markets remained competitive throughout FY2020, however we increased the number of energy customer accounts by 21,000, led by gains in residential gas and community energy services (CES). In addition, we grew our Broadband accounts by 12,000 with a continued focus on balancing share and customer lifetime value. Market churn reduced following the introduction of regulated default tariffs and we maintained a churn rate of 5 per cent below the market.

Our retail transformation program is on track and focused on improving customer experience, targeting a market-leading cost position and growing new revenue streams. Our Strategic NPS score increased to +2 as at 30 June 2020, increasing to +5 as at July 2020. We have simplified our product suite and continue to streamline and digitise the customer journey. Customers are increasingly choosing to engage with us through digital channels, 68 per cent of customers are now on e-billing and service call volumes reduced by a further 8 per cent this year. We are on track to achieve our target of reducing cost to serve by $100 million from FY2018 to FY2021 and growing our Solar, CES and Broadband businesses.

On 1 May 2020, we announced a strategic partnership with disruptive energy retailer and technology company, Octopus Energy, to adopt its globally distinctive operating model and proprietary Kraken platform as well as taking a 20 per cent equity stake. This partnership will accelerate our retail strategy by delivering superior customer experience, driving a further step change in cost reduction, and opening up further growth opportunities.

We are making good progress customising the Kraken platform for the Australian market and are on track to migrate our first customer cohort by the end of the calendar year. Our first group of Energy Specialists have been trained on Octopus Energy's UK Kraken platform and are supporting its UK customers.

Integrated Gas performance

Underlying EBITDA	Cash distributions from APLNG	Underlying ROCE
$1,741M	**$1,275M**	**8.2%**
Down $151m or 8% vs FY2019, Underlying EBIT up $46m	Up $301m or 31% vs FY2019	In line with FY2019
Record APLNG production (37.5%)	**Average realised LNG price**	**Opex and capex[1] / GJ**
265 PJ	**US$9.1/MMBTU**	**$3.5/GJ**
Up 4% vs FY2019	Down 10% vs FY2019, down 5% in A$ terms at $12.9/GJ	Down 13% vs FY2019

Integrated Gas Underlying EBITDA reduced as lower commodity hedging costs were more than offset by a decrease in share of APLNG Underlying EBITDA. This reflected a higher proportion of LNG sales into a weaker spot market, lower domestic sales volumes and average price, and higher costs associated with a change in accounting treatment for dewatering and workovers, which was more than offset by a reduction in ITDA.

APLNG delivered record production, reflecting improved field performance with higher well availability and facility reliability. Eurombah Reedy Creek Interconnect (ERIC) pipeline came online in July 2019 improving utilisation of processing capacity. Talinga Orana Gas Gathering Station (TOGGS) came online in July 2020, it compresses and transports gas through the Talinga to Condabri Interconnect Pipeline to utilise processing capacity in Condabri.

Total capital and operating expenditure[1] decreased by more than $200 million compared with FY2019. This was due to improved field performance resulting in less gas purchases and lower costs associated with well workovers, as well as reduced exploration, lower non-operated activity and lower infrastructure spend. As upstream operator, Origin delivered average operating costs of $1.0/GJ (excluding pipeline and major turnaround costs) and average standard unfracked vertical Surat well costs of $1.2 million. Total operating and capital expenditure in FY2020 was $3.50/GJ[1].

The four-yearly maintenance of 15 upstream operated gas processing facility trains was completed in early FY2020. Due to the COVID-19 pandemic, a shutdown of one LNG train planned for May 2020 was deferred to July 2021.

During the period:

- APLNG delivered record production of 265 PJ (Origin share), shipped its 500th LNG cargo and made record cash distributions to Origin of $1,275 million;
- Origin's share of APLNG 2P (proved plus probable) operated reserves increased 168 PJ or 5 per cent before production, reflecting higher estimated recovery from strong field performance, the inclusion of new areas to reserves and the Ironbark acquisition. This enabled a decision to not participate in less economic non-operated fields;
- APLNG executed new contracts for over 100 PJ of gas sales to domestic customers starting in calendar year 2020;
- both long-term buyers declared LNG downward quantity tolerance for calendar year 2020; and
- the first price review under APLNG's contract with Sinopec was completed with no change to the contract price.

In April 2020, Origin increased its interest in the Beetaloo Basin by 7.5 per cent to 77.5 per cent, in exchange for increasing its carry of its minority partner's share of costs by $25 million. Testing a liquids-rich gas play, the Kyalla horizontal well was drilled, cased and cemented during the period, before activity was paused due to COVID-19. Subject to COVID-19 related conditions, fracture stimulation of the Kyalla well is planned to resume in Q3/Q4 calendar year 2020 with extended production testing to follow.

[1] Operating cash costs excludes APLNG's Ironbark acquisition costs and purchases, and reflects royalties paid at the breakeven oil price. Royalties increase as oil price increases.

3. Strategy and prospects

Our business drivers

As a leading integrated energy company, Origin's earnings drivers are spread across the energy value chain.

Our electricity margin is predominantly driven by outperforming the market cost of energy through our generation portfolio (power stations and supply contracts). Although Origin generates less electricity than it sells, a significant portion of its wholesale costs are relatively fixed, and so margins are leveraged to movements in wholesale market prices as they flow through into retail tariffs.

In natural gas, Origin's wholesale margin is driven by a strong gas supply portfolio with pipeline and storage flexibility enabling us to direct gas to where it is most needed. A large portion of supply is under long-term contracts that are either fixed-price or linked to oil and Japan Korea Market (JKM) prices, some of which reprice to market over time.

Profitability in energy retailing is driven by attracting and retaining customers by providing a superior customer experience and low-cost service.

Origin is the upstream operator and has a 37.5 per cent interest in APLNG, which is Australia's largest CSG to LNG project. It is a significant supplier to both domestic gas and international LNG markets, with majority of volume contracted until approximately 2035. Profitability is underpinned by maintaining a low annual capital and operating cost base relative to revenues. In FY2020, approximately 72 per cent of APLNG gas volume was sold as LNG (of which 93 per cent was under long-term oil-linked contracts). The remaining 28 per cent was sold domestically via a mix of long-term and short-term contracts. This contracting strategy minimises our exposure to the short-term LNG market.

Market outlook

In the near term, COVID-19 has impacted the outlook for economic growth at the macro level as well as the specific markets in which we operate domestically and internationally.

International oil and LNG markets are experiencing reduced demand due to COVID-19, coinciding with a period of LNG oversupply. This has resulted in depressed prices for both commodities in the near term.

The domestic electricity and gas markets have also experienced reduced demand due to COVID-19, with electricity demand down 5-10 per cent over the fourth quarter of FY2020 (weather corrected). This coincides with increased supply of renewable energy and lower international gas prices, reducing the near-term outlook for domestic electricity and gas prices.

The impact on employment and economic conditions more generally will have implications for our customers, and will affect energy demand and affordability.

The path to recovery for the economy and the markets in which we operate will depend on the effectiveness of the health and community responses to contain the virus, and the policy response to mitigate the economic impacts.

In the longer term, we continue to expect global trends towards decarbonisation, decentralisation and digitisation will shape energy markets. If anything, we believe the enduring impacts of COVID-19 may accelerate the pace of change.

We expect:

- continued increases in large and small scale renewable energy will maintain downward pressure on average electricity prices, but will also increase volatility and the need for more reliable, dispatchable ('firming') capacity such as flexible gas-fired generation and battery storage, which Origin is well placed to supply;
- increased electrification over time, particularly in transportation near term;
- growth in global demand for gas in power generation, industrial heating, building heating and transportation;
- LNG markets to remain oversupplied in the near term, but that new supply will be required from the early 2030s;
- east coast domestic gas prices to be impacted by a number of factors, including Asian LNG and international oil prices, procurement and transportation costs; and
- retail markets to remain competitive, but with improved transparency due to market reference bill requirements.

It is in this context that we continue to evolve our strategy to respond to the short-term impacts of COVID-19 and position our business to capture value in a future shaped by these global trends.

Our strategy

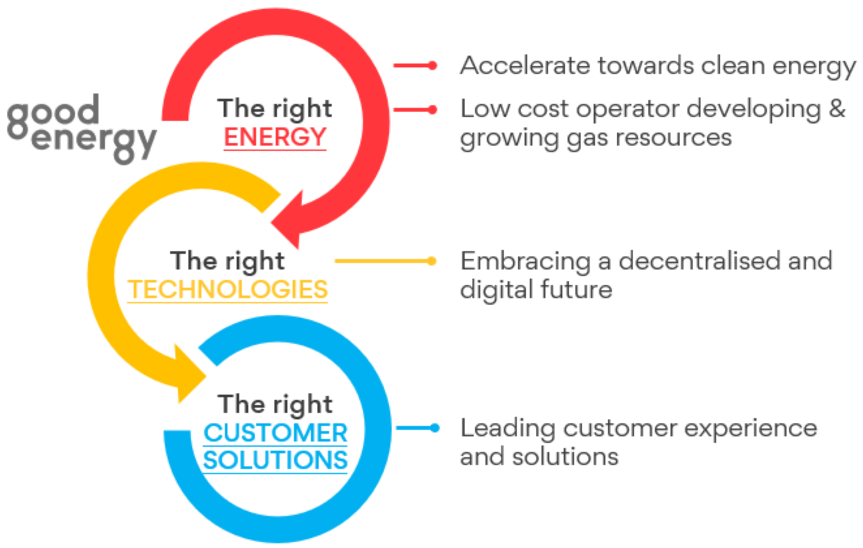
"Connecting customers to the energy and technologies of the future"

Our strategy is centred around our core beliefs:

Decarbonisation: Replacement of coal by renewables, partnered with firming capacity from gas, pumped hydro and storage will support emission reductions.

Decentralisation: Technological advancement and consumer desire for greater control will result in an increase in distributed generation and storage.

Digitisation: More connected homes and businesses will change all aspects of operations and customer experience.



Underpinned by a commitment to capital discipline

The right energy

We believe our generation and fuel supply portfolios provide flexibility to adapt and prosper in a changing energy market. We are targeting renewables and storage to account for more than 25 per cent of our owned and contracted generation capacity by the end of 2020, subject to development and commissioning timelines.

Our renewable target is supported by Origin being the sole off-taker of the 530 MW Stockyard Hill Wind Farm until the end of 2030. Tower components are now on site and 116 of the 149 turbines have been erected.

We own Australia's largest peaking gas generation fleet, which is well placed to provide firming capacity to support renewables and supply critical peak demand periods during extreme weather events or baseload supply shortages.

Coal currently plays a critical role for baseload supply in Australia, but with an ageing fleet and growing renewables driving down average prices and increasing intra-day volatility, the role of coal is diminishing. As coal is retired and use of renewables increases, the market will require investment in reliability. We are progressing a range of brownfield generation opportunities, including fast-start gas and batteries, which would further improve our flexibility and capacity to support the increase in renewables. Subject to market signals and regulatory certainty, we could quickly implement these at the appropriate time.

Low cost operator developing & growing gas resources

Our Integrated Gas business is anticipating lower short-term demand caused by COVID-19 and lower production accordingly. Strong field performance has enabled reduced development activity and provides the capability to ramp up production in response to demand, if required. APLNG continues to meet the needs of its customers and remains focused on key value drivers such as workover costs, fracture stimulation costs and horizontal wells.

Beyond APLNG, our strategy is to scale the low-cost upstream operating model to new development opportunities. In the Beetaloo Basin, we have a 77.5 per cent interest and operatorship of three exploration permits covering 18,500km^2. We are currently part way through Stage 2 of a farm-in work program targeting two independent potentially liquids-rich shale gas plays.

We are also farming into a 75 per cent interest and operatorship of five permits located in the Cooper-Eromanga Basin in south west Queensland. The staged farm-in work program involves the drilling of up to five exploration wells to be completed by the end of calendar year 2024 targeting both unconventional liquids and gas.

The right technologies

Embracing a decentralised and digital future

The energy markets around the world are rapidly transforming towards low-cost renewables and new digital technologies, and Australia is no exception. Continued penetration of decentralised generation and storage, combined with the rise of internet enabled devices, is changing the way our customers interact with us and use energy at home and in their businesses. We are developing a leading digital platform and analytics capability to connect millions of distributed assets and data points to provide more personalised and value-add services to our customers, both in front of and behind the meter.

We have developed a proprietary Virtual Power Plant (VPP) platform to connect, and use artificial intelligence to orchestrate, distributed assets such as air conditioning units, batteries, hot water systems and electric vehicle (EV) chargers. Through this platform, we have more than 85 MW from 11,000 connected customers. We expect this to increase as we demonstrate the benefits to both customers and to the grid of optimising these distributed assets at critical times of market volatility.

We are also working with other businesses to source technical solutions and capabilities. We are co-founders of the Free Electrons global energy group, which brings together global utilities and leading start-ups looking to deploy new technology. Domestically, we sponsor EnergyLab, Australia's leading platform for launching energy start-ups. Recent products include Spike (a gamified demand response program that rewards customers for reducing their energy use) and a portable battery product for the home.

Origin is also pursuing opportunities in low-carbon technologies such as hydrogen, e-mobility, small-scale LNG and carbon neutral LNG. In terms of hydrogen, Origin's integrated energy position provides a unique advantage in producing green hydrogen and ammonia using renewables. Hydrogen and ammonia demand is forecast to grow, allowing countries to reduce emissions and diversify fuel supply. In terms of e-mobility, we provide charging solutions and infrastructure, and are partnering with a fleet management operator to provide an end-to-end solution that will enable businesses to make a seamless transition to EVs. We are also undertaking a smart charging trial aimed at optimising the value for EV drivers and the grid.

The right customer solutions

Leading customer experience and solutions

Origin is Australia's largest energy retailer by number of customer accounts, and is well placed to harness opportunities to deliver value to customers in a changing energy landscape. Customers are at the heart of everything we do, and our immediate focus is to transform their experience to make it simple, seamless and increasingly digital.

In the near term, we are focused on delivering a superior customer experience, a market leading cost position and growing our product offerings including solar, CES and broadband.

Our strategic partnership with Octopus Energy, is expected to fast track our strategy to deliver a superior customer experience at even lower cost, while opening up future growth opportunities.

4. FY2021 guidance

Guidance is provided on the basis that market conditions and the regulatory environment do not materially change, adversely impacting on operations. Considerable uncertainty exists relating to potential ongoing impacts of COVID-19 and this guidance is subject to any further material impact on demand and customer affordability.

		FY20	FY21 guidance
Energy Markets Underlying EBITDA	A$m	1,459	1,150 – 1,300
Integrated Gas – APLNG 100%			
Production	PJ	708	650-680
Capex and opex, excluding purchases[(a)]	A$m	(2,482)	(2,000)-(2,200)
Unit capex + opex, excl. purchases[(a)]	A$/GJ	3.5	2.9-3.4
Distribution breakeven[(b)]	US$/boe	29	27-31
Integrated Gas – Other oil/LNG hedging and trading (loss)/gain[(c)]	A$m	(92)	50
Corporate			
Underlying costs	A$m	(59)	(75) – (85)
Capital expenditure (excluding investments)	A$m	(500)	(420) – (470)

[(a)] Operating cash costs excludes purchases and reflects royalties payable at breakeven oil prices.
[(b)] FY2020 foreign exchange rate: 0.67 AUD/USD, excludes Ironbark acquisition costs; FY2021 foreign exchange rate 0.69 AUD/USD.
[(c)] FY2021 guidance is based on forward market prices as at 17 August 2020.

Energy Markets

We estimate Energy Markets Underlying EBITDA to be lower than FY2020 at **$1,150-$1,300 million** driven by:

- Electricity Gross Profit reduction of $170-$220 million reflecting lower wholesale electricity and renewable certificate prices flowing into tariffs, and increased network costs of $40 million that are not recovered in regulated tariffs;
- Gas Gross Profit reduction of $100-$150 million reflecting the roll-off of certain long-term supply and transport capacity sales contracts ($70 million) and repricing of retail and business tariffs; and
- Cost to serve savings of approximately $70 million, in line with the target of >$100 million savings from FY2018 (subject to any additional material increase in bad and doubtful debts provisioning)

Integrated Gas

We estimate reduced APLNG (100 per cent) production in FY2021 of **650-680 PJ** reflecting anticipated lower demand with strong field capability to increase production in response to demand.

APLNG is able to further manage sales volumes through flexibility in lifted non-operated production and gas purchases.

We estimate total APLNG capex + opex of **$2.0-$2.2 billion** reflecting reduced development activity with fewer drilling rigs, reduced workovers and lower infrastructure spend due to TOGGS being online, and lower exploration and appraisal (E&A) spend.

APLNG is targeting FY2021 **distribution breakeven of US$27-31/boe** including US$12/boe in project finance costs.

We estimate a net gain on Origin's oil/LNG hedging and trading positions of $50 million based on current forward prices. Refer to Section 6.2.2 for details. Other Origin only costs are estimated to be similar to FY2020 and include overheads net of recoverables from APLNG, Beetaloo Basin and other costs.

Corporate

FY2021 Corporate costs are estimated to be **$75-$85 million,** reflecting higher costs associated with enterprise resource planning (ERP) replacement, FY2020 FX gains and Mortlake self-insurance costs not repeating.

Capital expenditure is estimated to be **$420-$470 million including $65–80 million E&A spend**, primarily relating to Beetaloo appraisal. This excludes $90-$100 million relating to the Octopus Energy investment.

Depreciation and amortisation is estimated to be **$50-$60 million** higher than FY2020 driven by decommissioning retail IT systems and increased generation restoration provisions.

5. Financial update

5.1 Reconciliation from Statutory to Underlying Profit

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Statutory Profit/(Loss)	**83**	**1,211**	**(1,128)**	**(93)**
Items Excluded from Underlying Profit (post-tax):				
Increase/(decrease) in fair value and foreign exchange movements	275	139	136	98
Oil and gas	*153*	*59*	*94*	*159*
Electricity	*85*	*(88)*	*173*	*(197)*
Foreign exchange and interest rate derivatives	*(46)*	*(43)*	*(3)*	*7*
Other financial assets/liabilities	*86*	*274*	*(188)*	*(69)*
Foreign exchange on foreign-denominated financing	*(3)*	*(63)*	*60*	*(95)*
Disposals, impairments, onerous contracts and business restructuring	(1,215)	44	(1,259)	(2,861)
Total Items Excluded from Underlying Profit (post-tax)	**(940)**	**183**	**(1,123)**	**(614)**
Underlying Profit	**1,023**	**1,028**	**(5)**	**(0)**

Fair value and foreign exchange movements reflect fair value gains/(losses) associated with commodity hedging, interest rate swaps and other financial instruments. These amounts are excluded from Underlying Profit to remove the volatility caused by timing mismatches in valuing financial instruments and the underlying transactions they relate to.

- Oil and gas derivatives manage exposure to fluctuations in the underlying commodity price to which Origin is exposed through its gas portfolio and indirectly through Origin's investment in APLNG. See Section 6.2.2 for details of Origin's oil hedging carried out in relation to its investment in APLNG.
- Electricity derivatives including swaps, options and forward purchase contracts, are used to manage fluctuations in wholesale electricity and environmental certificate prices in respect of electricity purchased to meet customer demand.
- Foreign exchange and interest rate derivatives manage exposure to foreign exchange and interest rate risk associated with the debt portfolio. A significant portion of debt is Euro-denominated and cross-currency interest rate swaps hedge that debt to AUD.
- Other financial assets/liabilities reflects investments held by Origin including MRCPS issued by APLNG[2].
- Foreign exchange on foreign-denominated financing reflects currency fluctuations on unhedged USD debt. Debt is maintained in USD to offset the USD investment in MRCPS, which delivers USD distributions.

Disposals, impairments, onerous contracts and business restructuring are either non-cash or non-recurring items and are excluded from Underlying Profit to better reflect the underlying performance of the business. They include:

- a non-cash impairment of $746 million relating to Origin's carrying value of APLNG. The charge is driven by a reduction in oil price assumptions over the near term and a revised long-term Brent crude oil price assumption of US$60/bbl (real 2020) from FY2026, partially offset by cost reductions from improved field and operating performance. There is no tax impact as any impact is offset by recognising part of a previously unrecognised deferred tax liability;
- a non-cash onerous provision charge of $455 million post-tax relating to a 20-year off-take contract from Cameron LNG. The provision is primarily due to a reduction in JKM LNG sale price assumptions, reflecting medium-term demand and moderately lower long-term prices driven by expected lower US gas liquefaction fees, as well as lower US treasury bond rates; and
- transaction costs of $8 million post-tax primarily relating to OC Energy integration and Origin restructuring costs of $6 million.

The nature of Items Excluded from Underlying Profit set out in the above table have been reviewed by our auditor for consistency with the description in note A1 of the Origin Energy Financial Statements.

[2] Under AASB 9, from 1 July 2018, Origin Energy holds MRCPS at fair value, rather than at cost.

5.2 Accounting changes

AASB 16 *Leases* has been adopted from 1 July 2019 which requires leases to be brought on balance sheet, resulting in a $97 million increase in Underlying EBITDA, more than offset by increases in depreciation and amortisation and financing costs with a net reduction to Underlying Profit after tax of $18 million. A lease liability of $514 million and a right-of-use (ROU) asset of $467 million have been recognised at 30 June 2020. Refer to Appendix 1 and the Overview section of the Origin Energy Financial Statements for details.

From 1 July 2019, APLNG dewatering and workover costs have been expensed as incurred within Underlying EBITDA rather than capitalised and amortised. Following a period of embedding steady state operations, these costs are considered ongoing and operational in nature going forward and the change in application of accounting practice reflects this. During commissioning of the project and in the lead up to steady state operations, these amounts were capitalised as they represented costs incurred to bring the assets into their intended state of use. This results in a $107 million reduction in share of APLNG EBITDA, which is more than offset by a $152 million reduction in share of depreciation and amortisation from APLNG. Refer to Appendix 2 and Section 6.2.1 for further information.

There has been no change to comparative information for the above accounting changes.

5.3 Underlying Profit

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Energy Markets	1,459	1,574	(115)	(7)
Integrated Gas - Share of APLNG	1,915	2,123	(208)	(10)
Integrated Gas - Other	(174)	(231)	57	(25)
Corporate	(59)	(234)	175	(75)
Underlying EBITDA	**3,141**	**3,232**	**(91)**	**(3)**
Underlying depreciation and amortisation	(509)	(419)	(90)	21
Underlying share of ITDA	(1,303)	(1,504)	201	(13)
Underlying EBIT	**1,329**	**1,308**	**21**	**2**
Underlying interest income - MRCPS	174	226	(52)	(23)
Underlying interest income - Other	16	8	8	100
Underlying interest expense	(316)	(388)	72	(19)
Underlying Profit before income tax and non-controlling interests	**1,203**	**1,154**	**49**	**4**
Underlying income tax expense	(177)	(123)	(54)	44
Non-controlling interests' share of Underlying Profit	(3)	(3)	-	-
Underlying Profit	**1,023**	**1,028**	**(5)**	**-**

Refer to Sections 6.1 and 6.2 respectively for Energy Markets and Integrated Gas analysis.

Corporate costs reduced by $175 million reflecting the prior year non-cash remediation provision increase of $170 million not repeating and $17 million FX gains primarily relating to hedging USD cash flow received from APLNG. This was partly offset by self-insurance costs of $7 million associated with the Mortlake electrical fault and higher costs associated with ERP replacement of $6 million.

Underlying depreciation and amortisation increased by $90 million, largely due to the impact of adopting the new leasing standard.

Underlying share of ITDA decreased $201 million driven by lower APLNG amortisation, reflecting the change in treatment of dewatering and workover costs, which are now directly expensed as incurred ($152 million), and reduced interest expense on project finance due to a lower average interest rate from refinancing activities at APLNG partly offset by a lower AUD/USD exchange rate. Refer to Section 6.2 for further detail.

Underlying interest income on MRCPS reduced $52 million driven by a lower balance following buy-backs by APLNG, partly offset by a lower AUD/USD exchange rate.

Underlying interest expense reduced by $72 million, $90 million after excluding the impact from adopting the leasing standard. This reflects a lower net debt balance and a lower average cost of debt due to refinancing activities. Refer to Section 5.6 for further detail.

5.4 Cash flows

Operating cash flow

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Underlying EBITDA	3,141	3,232	(91)	(3)
Underlying equity accounted share of EBITDA (non-cash)	(1,911)	(2,123)	212	(10)
Other non-cash items in Underlying EBITDA	157	277	(120)	(43)
Underlying EBITDA adjusted for non-cash items	1,387	1,386	1	0
Change in working capital	(222)	84	(306)	(364)
Energy Markets – excluding electricity futures collateral	*74*	*(63)*	*137*	*(217)*
Energy Markets – electricity futures collateral	*(340)*	*125*	*(465)*	*(372)*
Integrated Gas - excluding APLNG	*29*	*17*	*12*	*71*
Corporate	*15*	*5*	*10*	*200*
Other	-	(35)	35	(100)
Tax paid	(215)	(110)	(105)	95
Cash flow from operating activities	**951**	**1,325**	**(374)**	**(28)**

Cash flow from operating activities decreased $374 million primarily due to higher working capital requirements (-$306 million) and higher tax paid (-$105 million) associated with higher taxable income in FY2019.

Underlying share of EBITDA (non-cash) reflects share of APLNG ($1,915 million) and Octopus Energy (-$4 million). Other non-cash items include bad and doubtful debts (+$124 million) and share based remuneration (+$30 million).

Working capital increased $222 million, primarily due to collateral deposited with the futures exchange (-$340 million) associated with forward electricity hedge positions that are expected to unwind over time, lower net payables from lower wholesale gas and electricity prices (-$100 million) and higher inventory (-$26 million) driven by coal, partly offset by lower green inventory (+$90 million) and lower Retail and Business Energy net working capital (+$93 million).

Investing cash flow

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Capital expenditure	(500)	(341)	(159)	47
Cash distribution from APLNG	1,275	974	301	31
Interest received from other parties	18	2	16	800
Investments/acquisitions	(165)	(64)	(101)	158
Disposals	234	18	216	n/a
Cash flow from investing activities	**862**	**589**	**273**	**46**

FY2020 capital expenditure of $500 million comprises:

- generation sustain ($208 million) primarily related to major overhauls at Eraring Power Station ($92 million) and Uranquinty Power Station ($29 million), as well as Mortlake Power Station repairs ($41 million);
- other sustain ($115 million) including LPG ($26 million), Origin ERP system replacement ($23 million), regulatory market reforms ($20 million) and CES ($7 million);
- productivity/growth ($92 million) including Quarantine Power Station upgrade ($14 million), CES ($18 million), Kraken licensing costs ($13 million), LPG ($9 million), digital spend ($8 million), solar ($7 million) and other Energy Markets projects; and
- exploration and appraisal spend ($85 million) primarily related to the appraisal program in the Beetaloo Basin.

Cash distributions from APLNG amounted to $1,275 million comprising $181 million of MRCPS interest (down from $229 million in FY2019) and $1,094 million of MRCPS buy-backs (up from $745 million in FY2019).

Interest received increased reflecting a higher cash balance following refinancing in preparation for debt maturities.

Investments include initial payments and transaction costs for the equity interest in Octopus Energy ($128 million) and deferred consideration for OC Energy ($14 million). Disposals include sale of Ironbark to APLNG for $231 million.

Financing cash flow

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Net proceeds/(repayment) of debt	(1,173)	185	(1,358)	(734)
Operator cash call movements	56	7	49	700
On-market purchase of shares	(75)	(77)	2	(3)
Settlement of foreign currency contracts	(55)	(64)	9	(14)
APLNG loan repayment	(8)	(31)	23	(74)
Interest paid	(310)	(375)	65	(17)
Payment of lease principal	(75)	-	(75)	n/a
Dividends paid	(478)	(165)	(313)	190
Total cash flow from financing activities	**(2,118)**	**(520)**	**(1,598)**	**307**
Effect of exchange rate changes on cash	(1)	2	(3)	(150)

Repayment of debt reflects capital market debt repaid from cash held and Free Cash Flow.

Operator cash call movements represent the movement in funds held and other balances relating to Origin's role as upstream operator of APLNG. On-market purchase of shares represents the purchase of shares associated with employee share remuneration schemes and the dividend reinvestment plan. Settlement of foreign currency contracts represents the partial closure of contracts executed in prior periods to monetise the value in certain cross currency interest rate swap contracts. The value of outstanding contracts as at 30 June 2020 was $156 million.

Interest paid reduced by $65 million, comprising lower interest on debt due to refinancing activities ($81 million) partly offset by a $16 million increase in interest paid on lease liabilities.

Free Cash Flow

Free Cash Flow represents cash flow available to pay dividends, repay debt, invest in major growth projects or return surplus cash to shareholders. This is prepared on the basis of equity accounting for APLNG.

The Octopus Energy investment is considered a major growth project and $141 million of associated investing cash flow from consideration payments and capital expenditure has been excluded from FY2020 Free Cash Flow.

	Energy Markets		Integrated Gas – Share of APLNG		Integrated Gas – Other		Corporate		Total	
($m)	FY20	FY19	FY20	FY19	FY20	FY19	FY20	FY19	FY20	FY19
Underlying EBITDA	1,459	1,574	1,915	2,123	(174)	(231)	(59)	(234)	3,141	3,232
Non-cash items	137	90	(1,915)	(2,123)	11	7	13	180	(1,753)	(1,845)
Change in working capital	(266)	62	-	-	29	17	15	5	(222)	84
Other	(23)	(20)	-	-	24	(1)	(1)	(15)	-	(35)
Tax paid	-	-	-	-	-	-	(215)	(110)	(215)	(110)
Operating cash flow	**1,307**	**1,707**	**-**	**-**	**(109)**	**(208)**	**(247)**	**(174)**	**951**	**1,325**
Capital expenditure	(395)	(304)	-	-	(94)	(28)	(10)	(9)	(500)	(341)
Cash distribution from APLNG	-	-	-	-	1,275	974	-	-	1,275	974
(Acquisitions)/disposals	(165)	(53)	-	-	234	1	(0)	7	69	(46)
Interest received	-	-	-	-	-	-	18	2	18	2
Investing cash flow	**(560)**	**(357)**	**-**	**-**	**1,414**	**946**	**8**	**-**	**862**	**589**
Interest paid	-	-	-	-	-	-	(310)	(375)	(310)	(375)
Free Cash Flow including major growth	**747**	**1,350**	**-**	**-**	**1,305**	**737**	**(549)**	**(548)**	**1,503**	**1,539**
Major growth spend	141	-	-	-	-		-	-	141	-
Free Cash Flow	**888**	**1,350**	**-**	**-**	**1,305**	**737**	**(549)**	**(548)**	**1,644**	**1,539**

5.5 Dividends

The Board has determined to pay an unfranked 10 cps dividend in respect of the second half of FY2020, bringing total FY2020 dividends to 25 cps which represents 27 per cent of Free Cash Flow. The Board exercised discretion to set the payout ratio below the target 30 per cent to 50 per cent of Free Cash Flow. This reflects current and expected future economic and business conditions, particularly lower commodity prices.

During FY2020, $141 million was incurred in respect of the strategic partnership with Octopus Energy. This has been treated as major growth expenditure and excluded from Free Cash Flow when measuring the dividend pay-out percentage.

The nil franking percentage reflects the current franking credit balance. A low franking balance is expected over FY2021-23 due to realised foreign exchange losses on debt maturities and deducting the remaining tax cost base of Browse Basin exploration permits in the FY2020 income tax return. Refer to Origin Energy Financial Statements note E2 for further details.

Origin will seek to pay sustainable shareholder distributions through the business cycle and will target an ordinary dividend payout range of 30 per cent to 50 per cent of Free Cash Flow per annum. Distributions will take the form of franked dividends, subject to the company's franking credit balance. Free Cash Flow is defined as cash from operating activities and investing activities (excluding major growth projects), less interest paid.

Remaining cash flow after ordinary dividends will be applied to further debt reduction, value accretive organic growth and acquisition opportunities and/or additional capital management initiatives.

The Board maintains discretion to adjust shareholder distributions for economic and business conditions.

The Dividend Reinvestment Plan (DRP) will operate with nil discount and will be satisfied through on-market share purchases. The DRP price of shares will be the average purchase price, rounded to two decimal places, bought on market over a period of 10 trading days commencing on the third trading day immediately following the Record Date.

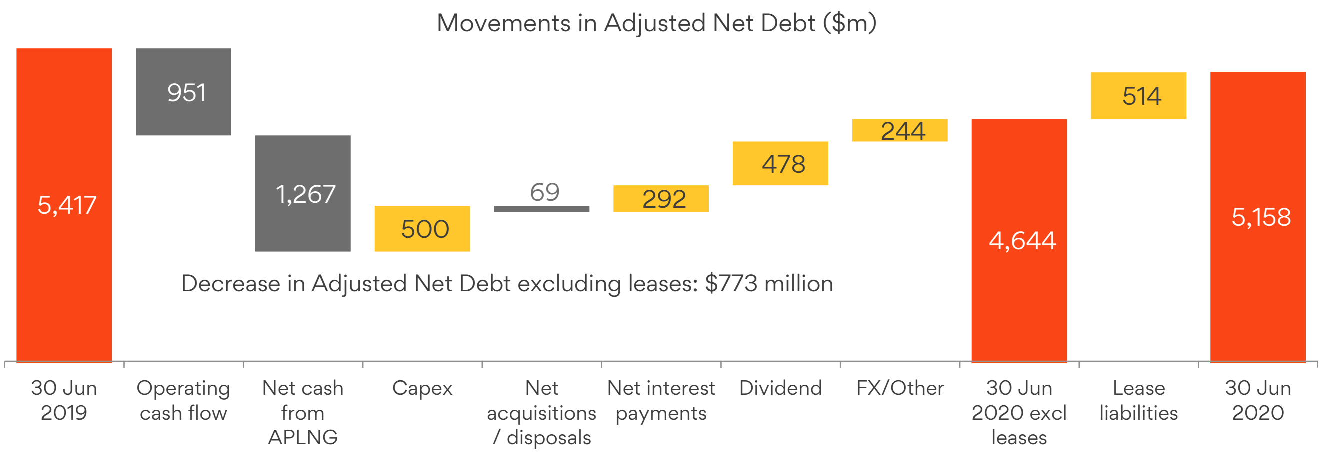
5.6 Capital management

During FY2020 the following capital management initiatives were completed:

- refinanced debt to lower rates and increase tenor:
  - raised €600 million (A$973 million) of 10 year debt at 3.2 per cent fixed interest rate;
  - raised A$300 million of 8 year debt at 2.7 per cent fixed interest rate;
  - repaid €500 million (A$939 million) 3.7 per cent effective interest rate debt;
  - redeemed €1,000 million (A$1,391 million) 7.9 per cent fixed interest rate hybrid obligation;
  - repaid NZ$141 million (A$125 million) 2.1 per cent effective interest rate debt obligation; and
  - renegotiated lower rates on A$500 million bank guarantee facility.
- cancelled $718 million in undrawn bank loan facilities that were surplus to requirements.

In July 2020, the maturity date of A$1.1 billion of bank debt facilities was extended from FY2023 to a later date in FY2025. Further surplus liquidity of $0.2 billion was cancelled as part of this transaction.

Adjusted Net Debt



Adjusted Net Debt excluding leases decreased $773 million, driven by strong APLNG cash distribution and operating cash flow. This was partially offset by capital expenditure, dividends, interest payments and foreign exchange/other impacts. After recognition of $514 million in lease liabilities under AASB 16 *Leases*, Adjusted Net Debt decreased by $259 million to $5,158 million. The increase in reported debt due to adopting AASB 16 will not have any material impact on the company's credit metrics as lease liabilities were previously included in these metrics.

Foreign exchange/other includes on-market purchase of shares ($75 million), payment of lease liabilities ($75 million), settlement of foreign currency contracts ($55 million) and non-cash translation of unhedged USD debt and fees.

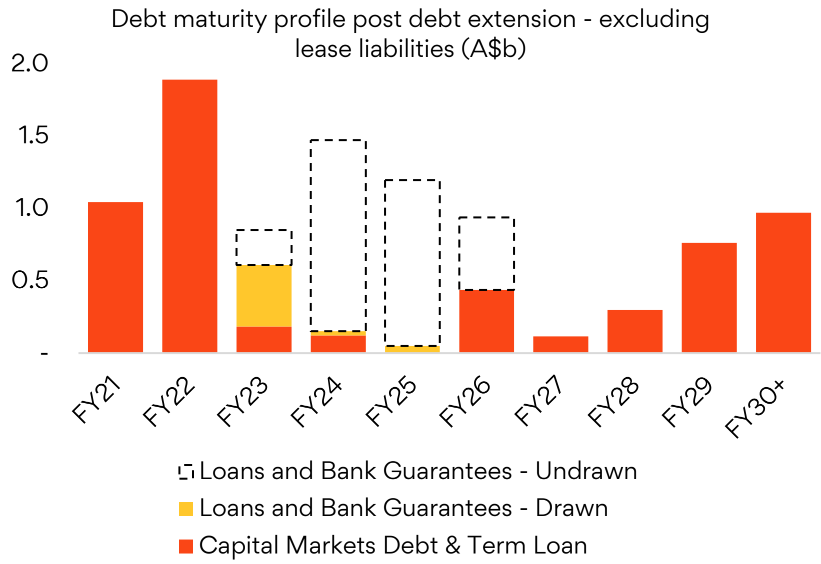
Origin's objective is to maintain an Adjusted Net Debt/Adjusted Underlying EBITDA ratio of 2.0-3.0x and a gearing target of 20 per cent to 30 per cent. As at 30 June 2020, this ratio was 2.1x and gearing was 29 per cent, compared to 2.6x and 29 per cent, respectively, at 30 June 2019.

Our long-term credit ratings are BBB (stable) from S&P and Baa2 (stable) from Moody's.

Debt portfolio management

Average term to maturity increased from 3.0 years at 30 June 2019 to 3.9 years at 30 June 2020, including the bank debt facility extension in July 2020. The rolling 12-month average interest rate on drawn debt decreased from 5.9 per cent in FY2019 to 4.8 per cent in FY2020.

As at 30 June 2020, Origin held $1.2 billion of cash and $2.9 billion in committed undrawn debt facilities after adjusting for the debt extension in July 2020. This liquidity position of $4.1 billion is held to meet near-term debt maturities of $1 billion by December 2020 and $1.9 billion maturing in October 2021, and to maintain a sufficient liquidity buffer.



APLNG funding

During construction of APLNG, shareholders contributed capital via ordinary equity and the investment in preference shares (termed MRCPS) issued by APLNG. APLNG distributes funds to shareholders firstly via fixed dividends of 6.37 per cent per annum on the MRCPS balance, recognised as interest income by Origin, and secondly via buy-backs of MRCPS, refer to Section 5.4 above. The fair value of MRCPS held by Origin at 30 June 2020 was A$2,109 million.

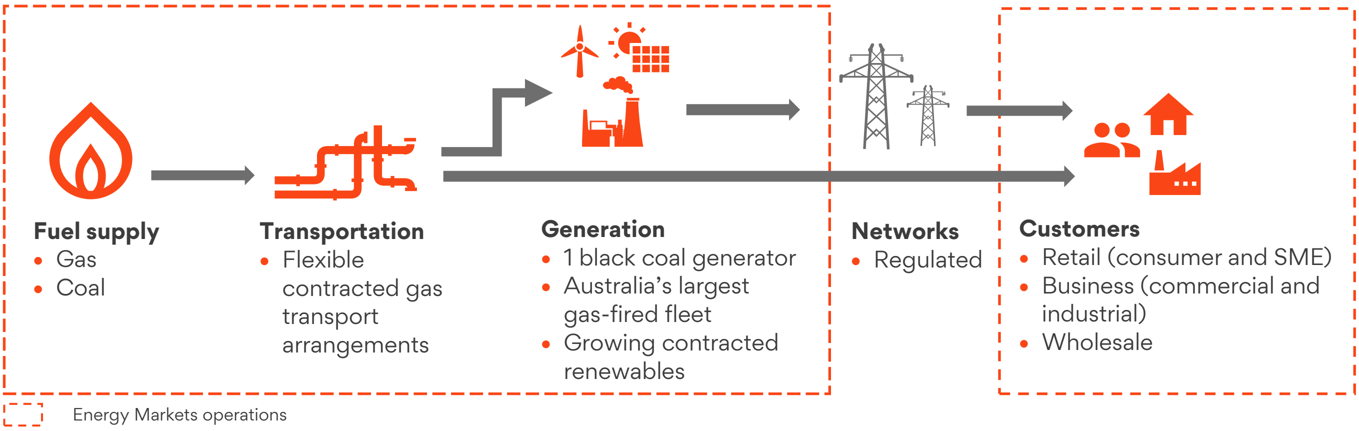
APLNG also funded construction via US$8.5 billion in project finance facilities, signed in 2012. These facilities were partially refinanced in FY2019. The outstanding balance at 30 June 2020 was US$6,386 million (A$9,307 million), net of unamortised debt fees of US$81 million (A$118 million). APLNG's average interest rate associated with its project finance debt portfolio for FY2020 was 3.6 per cent, and FY2021 is estimated to be approximately 3.1 per cent.

As at 30 June 2020, gearing[3] in APLNG was 28 per cent, down from 30 per cent at 30 June 2019.

[3] Gearing is defined as project finance debt less cash, divided by project finance debt less cash plus equity.

6. Review of segment operations

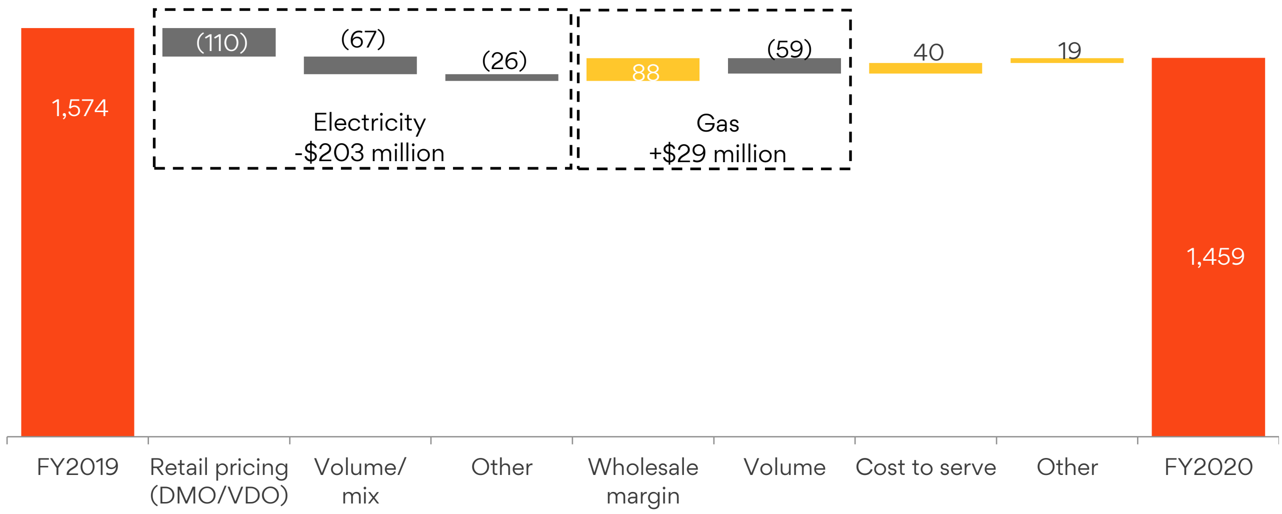
6.1 Energy Markets



Origin's Energy Markets business comprises Australia's largest energy retail business by customer accounts, Australia's largest fleet of gas-fired peaking power stations supported by a substantial contracted fuel position, a growing supply of contracted renewable energy and Australia's largest power station, the black coal-fired Eraring Power Station. Energy Markets reports on an integrated portfolio basis. Electricity and Natural Gas Gross Profit and retail cost to serve are reported separately, as are the EBITDA of the Solar and Energy Services, Future Energy and LPG divisions, and share of earnings from the 20 per cent equity holding in Octopus Energy Holdings Limited.

6.1.1 Financial summary

Underlying EBITDA/EBIT	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Electricity Gross Profit	1,187	1,390	(203)	(15)
Natural Gas Gross Profit	744	715	29	4
Electricity and Natural Gas cost to serve	(570)	(610)	40	(6)
LPG EBITDA	83	68	15	22
Solar and Energy Services EBITDA	33	26	8	30
Future Energy costs	(15)	(15)	-	-
Share of EBITDA from Octopus Energy	(4)	-	(4)	n/a
Underlying EBITDA	**1,459**	**1,574**	**(115)**	**(7)**
Underlying EBIT	**974**	**1,173**	**(199)**	**(17)**



6.1.2 Electricity

Volume summary

Volumes sold (TWh)	FY20 Retail	FY20 Business	FY20 Total	FY19 Retail	FY19 Business	FY19 Total	Change (TWh)	Change (%)
NSW[(a)]	7.8	8.7	16.5	8.4	9.4	17.8	(1.3)	(7.3)
Queensland	4.1	3.6	7.7	4.6	3.5	8.1	(0.4)	(5.0)
Victoria	2.9	3.4	6.2	3.1	4.0	7.1	(0.9)	(12.7)
South Australia	1.3	1.7	3.1	1.3	1.9	3.2	(0.1)	(3.1)
Total volumes sold	**16.1**	**17.4**	**33.5**	**17.4**	**18.8**	**36.2**	**(2.7)**	**(7.5)**

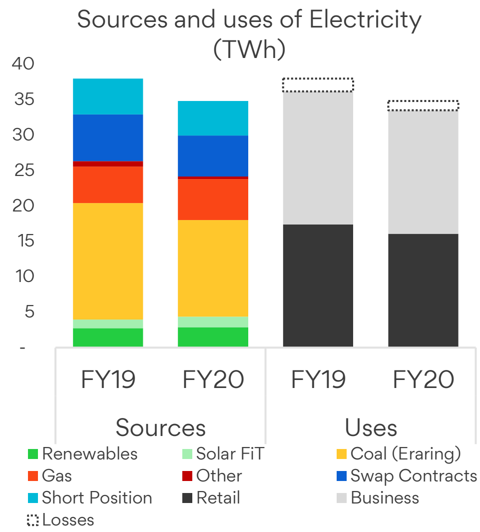
[(a)] Australian Capital Territory customers are included in New South Wales.

Gross Profit summary

	FY20 $m	FY20 $/MWh	FY19 $m	FY19 $/MWh	Change (%)	Change ($/MWh)
Revenue ($m)	**7,509**	**224.0**	**8,264**	**228.4**	**(9)**	**(4.3)**
Retail (consumer and SME)	4,569	283.9	5,056	290.5	(10)	(6.8)
Business	2,941	168.8	3,208	170.7	(8)	(1.9)
Cost of goods sold ($m)	**(6,322)**	**(188.6)**	**(6,874)**	**(189.9)**	**8**	**1.3**
Network costs	(3,142)	(93.8)	(3,287)	(90.8)	4	(2.9)
Energy procurement costs	(3,179)	(94.9)	(3,587)	(99.1)	11	4.3
Gross Profit ($m)	**1,187**	**35.4**	**1,390**	**38.4**	**(15)**	**(3.0)**
Gross margin %	15.8%		16.8%		(6)	

Electricity Gross Profit declined by $203 million[4] driven by:

- $3/MWh decrease in unit margins (-$136 million) comprising:
  - -$110 million from the introduction of the DMO and VDO regulated retail pricing tariffs on 1 July 2019;
  - -$21 million driven by costs associated with unplanned outages at the Eraring and Mortlake plants, net of insurance recoveries;
  - -$64 million reflecting higher solar feed-in tariffs and discounts to concession customers (-$34 million), and lower green scheme prices in Business tariffs (-$30 million); offset by
  - +$59 million margin improvement including from lower wholesale procurement and fuel costs, and a $33 million release of a rehabilitation provision, partially offset by lower Business tariffs.
- 2.7 TWh volume decline (-$67 million) relating to lower usage from milder weather, solar uptake and efficiency (-$33 million), COVID-19 impacts (-$26 million) and customer movements relating to large Business and SME tenders (-$8 million).



Owned and contracted generation of 22.5 TWh was lower by 2.1 TWh driven primarily by Eraring Power Station (-2.9 TWh) due to outages and lower output in response to reduced customer demand from COVID-19, and Mortlake Power Station (-0.3 TWh) reflecting the outage in the first half. This was partially offset by Darling Downs Power Station (+1.1 TWh) with more gas available to generation following the roll-off of short-term wholesale gas trading contracts in FY2019.

Energy procurement costs decreased with lower volumes. Unit procurement costs reduced by $4.30/MWh driven by lower wholesale procurement costs, contract prices and fuel costs, offset by higher solar feed-in tariff rates.

[4] Includes a $4 million benefit relating to AASB 16 *Leases*.

Wholesale energy costs

	FY20 $m	FY20 TWh	FY20 $/MWh	FY19 $m	FY19 TWh	FY19 $/MWh
Fuel cost [a]	992	19.6	50.6	1,132	21.8	51.9
Generation operating costs	216	19.6	11.0	230	21.8	10.6
Owned generation[a]	1,208	19.6	61.6	1,363	21.8	62.4
Net pool costs[b]	303	4.9	61.3	449	5.0	90.5
Bundled renewable PPAs[c]	264	2.9	92.1	255	2.7	93.1
Market contracts	362	6.0	60.3	508	7.3	69.6
Solar feed-in tariff	181	1.5	117.9	127	1.2	103.3
Capacity hedge contracts	342			317		
Green Schemes (excl. PPAs)	506			569		
Other	14			-		
Energy procurement costs	**3,179**	**35.0**[d]	**90.9**	**3,587**	**38.0**[d]	**94.4**

[a] Includes volume from internal generation and contracted from Pelican Point.
[b] Net pool costs includes gross pool purchase costs net of pool revenue from generation, gross and net settled PPAs, and other contracts.
[c] Bundled PPAs includes cost of electricity and renewable certificates. Market contracts include swap and energy hedge contracts.
[d] Volume differs from sales volume due to energy losses of 1.3 TWh (FY2019: 1.8 TWh).

Electricity supply

	Nameplate capacity (MW)	Type[a]	FY20 Output (GWh)	FY20 Pool revenue ($m)	FY20 Pool revenue ($/MWh)	FY19 Output (GWh)	FY19 Pool revenue ($m)	FY19 Pool revenue ($/MWh)	Change Output (GWh)	Change Pool revenue ($m)	Change Pool revenue ($/MWh)
Eraring	2,922										
Units 1-4	2,880	Black Coal	13,634	1,065	79	16,513	1,494	90	(2,879)	(429)	(11)
GT	42	OCGT	-	-	-	-	-	-	-	-	-
Darling Downs	644	CCGT	2,067	130	79	931	92	98	1,137	39	(19)
Osborne[b]	180	CCGT	703	58	93	759	105	138	(56)	(47)	(45)
Uranquinty	664	OCGT	422	75	125	333	53	160	89	22	(35)
Mortlake	566	OCGT	932	91	106	1,204	207	172	(272)	(116)	(66)
Mount Stuart	423	OCGT	4	0	103	9	1	132	(5)	(1)	(29)
Quarantine	230	OCGT	188	29	153	194	45	232	(6)	(16)	(79)
Ladbroke Grove	80	OCGT	155	19	123	157	29	182	(2)	(10)	(59)
Roma	80	OCGT	17	2	109	24	3	130	(7)	(1)	(21)
Shoalhaven	240	Pump/ Hydro	156	26	135	157	20	130	(1)	6	6
Internal generation	**6,029**		**18,279**	**1,495**	**82**	**20,281**	**2,050**	**101**	**(2,002)**	**(555)**	**(19)**
Pelican Point	240	CCGT	1,317			1,548			(231)		
Renewable PPAs	1,207	Solar / Wind	2,871			2,744			127		
Owned and contracted generation	**7,476**		**22,467**			**24,574**			**(2,106)**		

[a] OCGT = open cycle gas turbine; CCGT = combined cycle gas turbine.
[b] Origin has a 50 per cent interest in the 180 MW plant and contracts 100 per cent of the output.

6.1.3 Natural Gas

Volume summary

Volumes sold (PJ)	FY20 Retail	FY20 Business	FY20 Total	FY19 Retail	FY19 Business	FY19 Total	Change (PJ)	Change (%)
NSW[a]	11.0	22.8	33.8	10.1	19.7	29.8	4.0	13
Queensland	3.1	66.9	70.0	3.3	92.3	95.5	(25.6)	(27)
Victoria	25.2	58.3	83.6	22.4	57.5	79.9	3.7	5
South Australia[b]	5.7	10.6	16.2	5.6	11.0	16.7	(0.4)	(2)
External volumes sold	**45.0**	**158.6**	**203.6**	**41.4**	**180.5**	**222.0**	**(18.3)**	**(8)**
Internal sales (generation)			55.6			49.4	6.2	
Total volumes sold			**259.2**			**271.3**	**(12.1)**	**(4)**

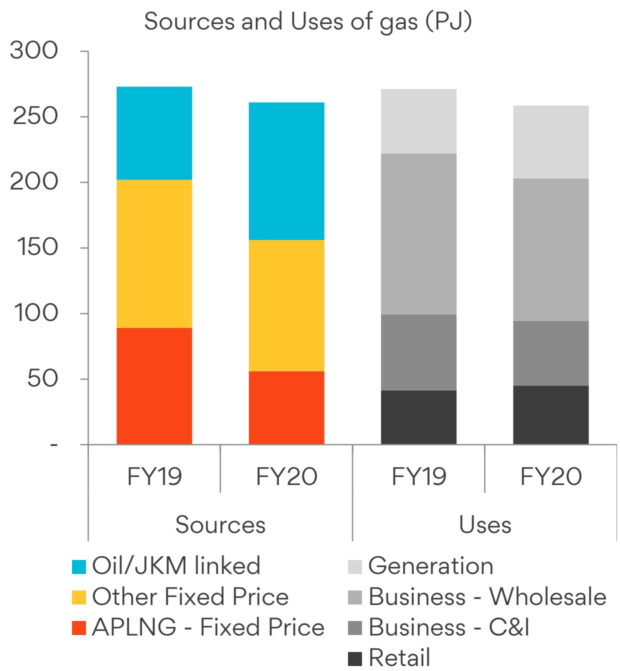
[a] Australian Capital Territory customers are included in New South Wales.
[b] Northern Territory and Western Australia customers are included in South Australia.

Gross Profit summary

	FY20 $m	FY20 $/GJ	FY19 $m	FY19 $/GJ	Change (%)	Change ($/GJ)
Revenue ($m)	**2,835**	**13.9**	**2,926**	**13.2**	**(3)**	**0.7**
Retail (consumer and SME)	1,163	25.8	1,064	25.7	9	0.2
Business	1,673	10.5	1,862	10.3	(10)	0.2
Cost of goods sold ($m)	**(2,090)**	**(10.3)**	**(2,211)**	**(10.0)**	**5**	**(0.3)**
Network costs	(796)	(3.9)	(739)	(3.3)	(8)	(0.6)
Energy procurement costs	(1,294)	(6.4)	(1,472)	(6.6)	12	0.3
Gross Profit ($m)	**744**	**3.7**	**715**	**3.2**	**4**	**0.4**
Gross margin %	26.3%		24.4%		7	

Natural Gas Gross Profit increased $29 million driven by:

- $0.4/GJ margin improvement (+$88 million) primarily due to lower average procurement costs from oil/JKM linked supply contracts and shorter-term purchases; and
- 18.3 PJ decrease in external sales (-$59 million) due to the roll-off of short-term wholesale trading contracts in Queensland and expiry of C&I contracts and demand impacts from COVID-19 (-$10 million). This was partially offset by higher Retail volumes due to higher customer numbers and cooler weather in Victoria.



6.1.4 Electricity and Natural Gas cost to serve

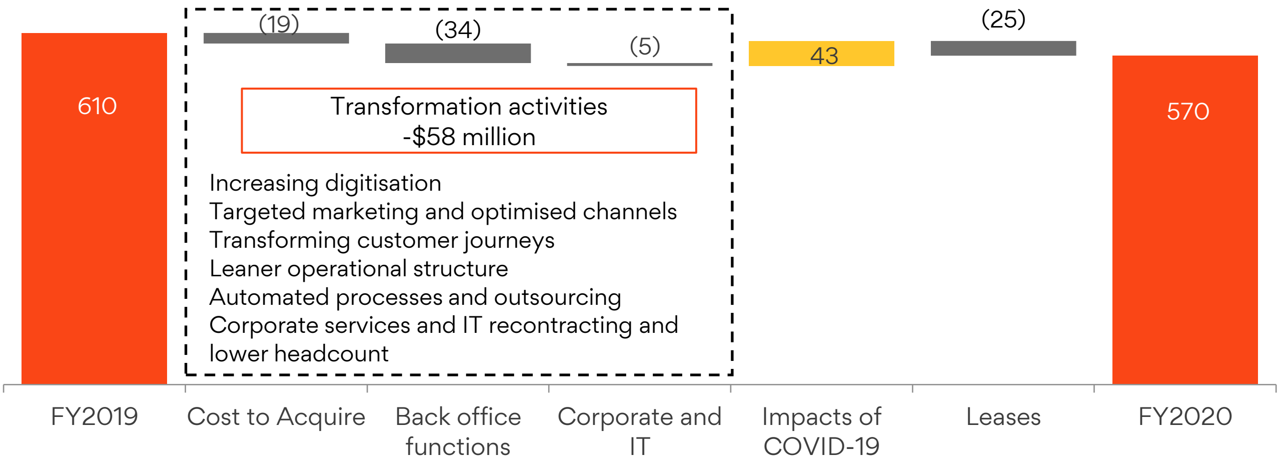
	FY20	FY19	Change ($)	Change (%)
Cost to maintain ($ per average customer[a])	(121)	(126)	5	(4)
Cost to acquire/retain ($ per average customer[a])	(38)	(43)	5	(11)
Electricity and Natural Gas cost to serve ($ per average customer[a])	**(159)**	**(169)**	**10**	**(6)**
Maintenance costs ($m)	(434)	(455)	21	(5)
Acquisition and retention costs[b] ($m)	(136)	(155)	19	(12)
Electricity and Natural Gas cost to serve ($m)	**(570)**	**(610)**	**40**	**(6)**

[a] Represents cost to serve per average customer account, excluding CES accounts.
[b] Customer wins (FY2020: 491,000; FY2019: 527,000) and retains (FY2020: 1,396,000; FY2019: 1,796,000).

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Labour	*(150)*	*(173)*	*23*	*(13)*
Bad and doubtful debts	*(113)*	*(80)*	*(33)*	*41*
Other variable costs	*(125)*	*(158)*	*33*	*(21)*
Retail and Business	(388)	(411)	23	(6)
Wholesale	(51)	(62)	12	(19)
Corporate services and IT	(131)	(136)	5	(4)
Electricity and Natural Gas cost to serve	**(570)**	**(610)**	**40**	**(6)**

In FY2020, we undertook a number of measures to support customers financially impacted by COVID-19, including pausing late payment fees, default listings and disconnections, and providing payment extensions at a cost of $5 million. Notwithstanding these measures and the broader government and business support in place, we recognised an increase in our bad and doubtful debt provision of $38 million[5] related to the risks associated with COVID-19.

Overall, Electricity and Natural Gas cost to serve reduced by $40 million driven by operating cost savings of $58 million and lower leasing charges of $25 million associated with adopting AASB 16 *Leases*. This was partially offset by $43 million related to the impacts of COVID-19 detailed above. Bad debt expense as a percentage of total Electricity and Natural Gas revenue increased to 1.09 per cent in FY2020, up from 0.71 per cent in FY2019.



We are on track to deliver the target of $100 million cost reduction by FY2021 from a baseline in FY2018. Planning is underway for a further reduction of $100–150 million in cash savings by FY2024 following successful implementation of the Octopus Energy's Kraken platform and operating model.

[5] The total increase in bad and doubtful debt provision relating to COVID-19 risks was $40 million, of which $38 million impacted electricity and gas cost to serve and the remainder impacted the Solar and Energy services division.

Customer accounts

As at Customer accounts ('000)[c]	30 June 2020 Electricity	Natural Gas	Total	30 June 2019 Electricity	Natural Gas	Total	Change
NSW[a]	1,191	335	1,526	1,193	312	1,505	22
Queensland	645	181	825	660	182	842	(16)
Victoria	556	479	1,035	558	474	1,032	3
South Australia[b]	239	225	464	229	223	451	13
Total	**2,631**	**1,220**	**3,851**	**2,639**	**1,191**	**3,830**	**21**
Average	**2,624**	**1,204**	**3,827**	**2,645**	**1,157**	**3,802**	**25**

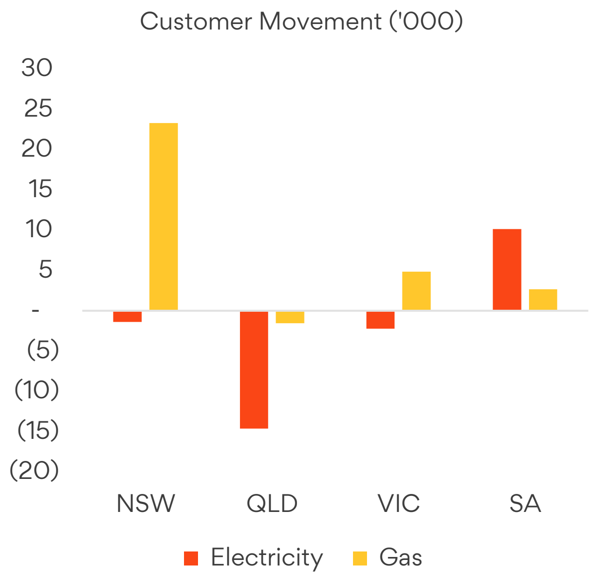
[a] Australian Capital Territory customers are included in New South Wales.
[b] Northern Territory and Western Australia customers are included in South Australia.
[c] Includes 257,000 CES customers (FY2019: 233,000).

Although price dispersion and in situ churn have reduced following the introduction of the DMO and VDO, the market remains highly competitive and we continue to take a disciplined approach to share and customer lifetime value.

Origin churn decreased to 13.4 per cent during the period, compared to market churn of 18.4 per cent.

Period end customers rose by 21,000 overall. Electricity customers fell by 8,000, reflecting a reduction in SMEs of 20,000 primarily relating to large tenders. This was partially offset by growth in embedded network customers as the CES business continues to grow. Natural Gas customers increased by 29,000, driven primarily by gains in New South Wales.

Broadband customer accounts increased by 12,000 during the year to a total of 20,000 customer accounts at 30 June 2020.



6.1.5 LPG

	FY20	FY19	Change	Change (%)
Volumes (kT)	417	426	(9)	(2)
Revenue ($m)	608	674	(66)	(10)
Cost of goods sold ($m)	(417)	(470)	54	(11)
Gross Profit ($m)	**191**	**204**	**(13)**	**(6)**
Operating costs ($m)	(108)	(136)	28	(20)
Underlying EBITDA ($m)	**83**	**68**	**15**	**22**

Origin is one of Australia's largest LPG and propane suppliers, procuring and distributing LPG to residential and business locations across Australia and the Pacific. As at 30 June 2020, Origin had 363,000 LPG customer accounts, up from 362,000 customer accounts at 30 June 2019.

Gross Profit decreased by $13 million driven by the impact of COVID-19 on demand, primarily in the Pacific. Both revenue and cost of goods sold decreased due to lower international commodity pricing, which is a key component of pricing to customers. Operating costs decreased $27 million, due to the impact of adopting AASB 16 *Leases* ($30 million). Underlying operating costs were stable.

6.1.6 Solar and Energy Services

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Revenue	298	216	82	38
CES Gross Profit	75	57	18	32
Solar Gross Profit	31	26	5	19
Other Gross Profit	5	6	(1)	(17)
Gross Profit	**111**	**89**	**22**	**25**
Operating costs	(77)	(64)	(13)	20
Underlying EBITDA	**33**	**26**	**8**	**27**

Origin provides installation of solar photovoltaic (PV) systems and batteries to residential and business customers, and ongoing support and maintenance services. Community Energy Services supplies both electricity and gas to apartment owners and occupiers, and body corporates through embedded networks and serviced hot water.

Underlying EBITDA increased by $8 million, primarily driven by growth in CES Gross Profit (+$18 million), in particular the acquisition of OC Energy in February 2019. This was partially offset by increased operating costs (-$14 million) driven primarily by the OC Energy acquisition, and includes a $3 million benefit due to the impact of adopting AASB 16 *Leases*.

6.1.7 Future Energy

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Operating costs	(15)	(15)	-	n/a
Investments	(15)	(35)	(20)	(56)

Future Energy is focused on new business models to connect distributed assets and data to customers. We have developed a Virtual Power Plant (VPP) platform that is able to orchestrate millions of distributed assets using artificial intelligence. The VPP has more than 85 MW connected today from more than 11,000 customers and we expect it to grow as the benefits to customers and the grid are realised. We have also developed a leading digital and analytics capability and are actively investing in technology for new customer solutions both in front of and behind the meter.

Operating costs remained flat during the period. The business continues to make small investments in trialling new energy solutions.

6.1.8 Octopus Energy

Origin has acquired a 20 per cent interest in Octopus Energy and a licence in Australia to its market-leading customer platform, Kraken. Over the next 24 to 30 months, Origin will transfer its retail electricity and gas customer accounts to the Kraken platform and adopt Octopus Energy's leading operating model with targeted cash savings of $70-80 million in FY2022 increasing to $100-150 million annually from FY2024.

We are making good progress in customising the Kraken platform for the Australian market and are on track to have our first customer cohort migrated by the end of the calendar year. Base functionality for NSW is well progressed and we have moved a small group of 'family and friends' onto the platform for further testing.

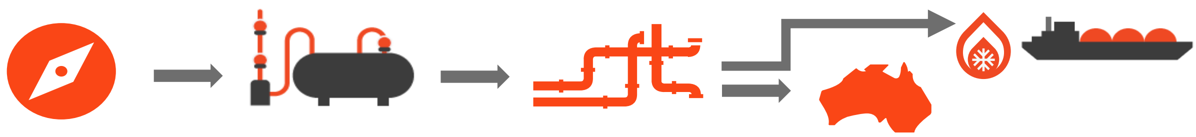
Our first group of Energy Specialists have been trained on the UK Kraken platform and are supporting Octopus Energy's UK customers. These Energy Specialists are gaining valuable experience in using Kraken and will be transitioning to the Australian platform as we start to migrate the first customer cohort.

The $4m loss as shown in Section 6.1.1 represents our share of EBITDA from Octopus Energy from 1 May to 30 June 2020. The loss in these months represents warmer weather reducing gas demand and increasing net wholesale costs.

6.2 Integrated Gas

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Share of APLNG (see Section 6.2.1)	1,915	2,123	(208)	(10)
Integrated Gas - Other (see Section 6.2.2)	(174)	(231)	57	(25)
Underlying EBITDA	**1,741**	**1,892**	**(151)**	**(8)**
Underlying depreciation and amortisation	(29)	(18)	(11)	61
Underlying share of ITDA from APLNG	(1,296)	(1,504)	208	(14)
Underlying EBIT	**416**	**370**	**46**	**12**

6.2.1 Share of APLNG



Origin has a 37.5 per cent shareholding in APLNG, an equity accounted incorporated joint venture. APLNG operates Australia's largest CSG to LNG export project (by nameplate capacity) with the country's largest 2P CSG reserves[6] Origin is the operator of the upstream CSG exploration and appraisal, development and production activities. ConocoPhillips is the operator of the 9 mtpa two train LNG liquefaction facility at Gladstone in Queensland.

As APLNG is an equity accounted incorporated joint venture, Integrated Gas reports its share of APLNG EBITDA. The share of APLNG ITDA is recorded as one-line item between EBITDA and EBIT.

APLNG acquired various CSG interests from Tri-Star in 2002 that are subject to reversionary rights and an ongoing royalty interest in favour of Tri-Star. These interests represent approximately 20 per cent of APLNG's 2P CSG reserves and approximately 19 per cent of 3P (proved plus probable plus possible) CSG reserves (as at 30 June 2020). Refer to Section 7 for disclosure relating to Tri-Star litigation associated with these CSG interests.

Financial summary - APLNG

Profit and Loss ($m)	FY20 APLNG 100%	Origin share	FY19 APLNG 100%	Origin share
Commodity revenue and other income[a]	7,100	2,662	7,443	2,791
Operating expenses	(1,992)	(747)	(1,781)	(668)
Underlying EBITDA	**5,108**	**1,915**	**5,662**	**2,123**
Depreciation and amortisation	(1,863)	(699)	(2,116)	(794)
MRCPS interest expense	(463)	(174)	(602)	(226)
Project finance interest expense	(372)	(140)	(590)	(221)
Other financing expense	(102)	(37)	(72)	(27)
Interest income	40	15	51	19
Income tax expense	(708)	(266)	(699)	(262)
Underlying ITDA[b]	**(3,468)**	**(1,301)**	**(4,027)**	**(1,510)**
Underlying Profit	**1,640**	**614**	**1,635**	**613**

[a] Includes commodity revenue plus other income of $19 million (Origin share) (FY2019: $2 million) primarily related to a release of the restoration provision from the relinquishment of the Gilbert Gully permit during FY2020.
[b] See Origin Financial Statement note B2.1 for details relating to a $5 million difference between APLNG ITDA and Origin's reported share.

[6] As per EnergyQuest Energy Quarterly, June 2020.

Origin's share of APLNG Underlying EBITDA decreased by $208 million including a $107 million decrease relating to the change in accounting treatment for dewatering and workover costs (previously capitalised and now directly expensed as incurred). This was partially offset by a $13 million increase related to adopting AASB 16 *Leases*. Excluding the above accounting impacts, Origin's share of APLNG Underlying EBITDA decreased $114 million driven by:

- commodity and other revenue decreasing by $129 million, as result of a higher proportion of LNG sales into a weaker spot market as well as lower domestic sales volumes and lower average price; and
- operating expenses reducing $15 million, (after excluding the above accounting impacts of $94 million) primarily driven by lower purchases ($55 million) and other cost reductions ($15 million). This was partially offset by higher royalties and tariffs ($26 million), exploration write-off ($21 million) and higher downstream operating costs ($8 million). See below for further details.

The decrease in Origin's share of depreciation and amortisation reflects the removal of amortisation related to workovers and dewatering of $152 million, partially offset by the impact of a lower AUD/USD exchange rate.

Origin's share of MRCPS interest expense decreased by $52 million due to a lower MRCPS balance following buy-backs by APLNG. This was partially offset by the impact of a lower AUD/USD exchange rate. Project finance interest decreased by $81 million due to a lower average interest rate from refinancing activities partly offset by the impact of a lower AUD/USD exchange rate. See Section 5.6 for details relating to APLNG funding.

APLNG volume summary

Volume and price summary	FY20 APLNG 100%	Origin share	FY19 APLNG 100%	Origin share
Production volumes (PJ)				
Operated	542	203	522	196
Non-operated	165	62	157	59
Total production	**708**	**265**	**679**	**255**
Purchases	17	7	32	12
Changes in upstream gas inventory/other	(15)	(6)	1	0
Liquefaction/downstream inventory/other	(42)	(16)	(36)	(13)
Sales volumes (PJ)	**668**	**251**	**676**	**254**
Domestic gas sales volumes	187	70	195	73
LNG spot sales volumes	32	12	17	7
LNG contract sales volumes	449	169	464	174
Commodity revenue ($m)	**7,049**	**2,643**	**7,436**	**2,789**
Natural Gas sales	861	323	983	369
LNG sales	6,188	2,320	6,453	2,420
Realised price				
Natural Gas ($A/GJ)	4.61		5.04	
LNG (A$/GJ)	12.86		13.42	
LNG (US$/mmbtu)	9.12		10.12	

Origin's share of APLNG production increased 10 PJ to 265 PJ in FY2020, with improved performance across operated and non-operated assets driven by stronger field and facility performance and the Eurombah Reedy Creek Interconnect pipeline (ERIC) online from July 2019 improving utilisation of processing capacity. This was partially offset by reduced operated production in the final quarter in response to lower demand due to COVID-19.

Origin's FY2020 share of APLNG commodity revenue decreased 5 per cent to $2,643 million with increased production offset by lower purchases and building up of inventory. The average realised LNG price decreased 4 per cent to A$12.86/GJ reflecting a higher proportion of spot LNG sales. The average realised domestic gas price decreased 9 per cent to $4.61/GJ driven by reduced short-term sales prices.

Cash flow – APLNG 100%

A$m	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Underlying EBITDA	5,108	5,662	(554)	(10)
Non-cash items in underlying EBITDA	66	(4)	70	n/a
Change in working capital	64	(34)	98	(288)
Other	4	(88)	92	(105)
Operating Cash flow*	**5,242**	**5,536**	**(294)**	**(5)**
Capital expenditure*	(1,038)	(1,277)	239	(19)
Capitalised de-watering costs*	-	(101)	101	(100)
Interest income*	40	50	(10)	(20)
Asset purchases (including Ironbark)/sale proceeds*	(245)	30	(275)	n/a
Loan repaid by/(advanced to) Origin	8	31	(23)	(74)
Loans paid by other shareholders	6	9	(3)	(33)
Investing Cash flow	**(1,229)**	**(1,258)**	**29**	**(2)**
Project finance interest and transaction costs*	(382)	(513)	131	(26)
Repayment of project finance*	(731)	(808)	77	(10)
Other financing activities*	(45)	(85)	40	(47)
Repayment of lease liabilities*	(80)	-	(80)	n/a
Interest on lease liabilities*	(19)	-	(19)	n/a
MRCPS interest	(480)	(611)	131	(21)
MRCPS buy-back	(2,918)	(1,987)	(931)	47
Financing cash flow	**(4,655)**	**(4,004)**	**(651)**	**16**
Net increase/(decrease) in cash and cash equivalents	**(642)**	**274**	**(916)**	**(334)**
Effect of exchange rate changes on cash*	104	113	(9)	(8)
Net increase/(decrease) in cash including Foreign exchange movement	**(538)**	**387**	**(925)**	**(239)**
Distributable cash flow*	**2,846**	**2,945**	**(99)**	**(3)**

* Included in distributable cash flow. Distributable cash flow represents the net increase in cash including foreign exchange movements before MRCPS interest and buy-backs and transactions with shareholders.

APLNG generated distributable cash flow of $2,846 million (Origin's 37.5 per cent share: $1,067 million) at an effective oil price of US$68/bbl (FY2019: US$73/bbl) after servicing project finance interest and principal. Cash distributions to Origin were higher at $1,275 million in FY2020 reflecting partial draw down of cash retained at 30 June 2019. APLNG's cash balance at 30 June 2020 was $1,072 million ($1,610 million at 30 June 2019).

Operating cash costs - APLNG 100%

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Purchases	(89)	(235)	146	(62)
Royalties and tariffs[(a)]	(502)	(433)	(69)	16
Operated opex[(b)]	(561)	(562)	1	(0)
Non-operated opex	(202)	(197)	(5)	3
Downstream opex	(248)	(228)	(20)	9
APLNG Corporate / other	(105)	(126)	21	(17)
Dewatering[(b)]	(106)	-	(106)	n/a
Workovers	(179)	-	(179)	n/a
Total operating expenses per Profit and Loss	**(1,992)**	**(1,781)**	**(211)**	**12**
Add capitalised de-watering costs	-	(101)	101	(100)
Other cash items	(63)	(61)	2	(3)
Total operating cash costs	**(2,055)**	**(1,943)**	**(112)**	**6**

(a) Reflects actual royalties paid. At break-even prices royalties and tariffs would have amounted to $96 million (FY2019: $139 million).
(b) FY2020 unit operating costs of $1.0/GJ reflects operated opex ($561 million) less pipeline and major turnaround costs ($68 million) plus operated dewatering costs ($76 million) and 542 PJ operated production.

Operating expenses increased $211 million, of which $285 million relates to dewatering and workover costs previously capitalised. The remaining decrease of $74 million was primarily driven by lower purchases ($146 million), partially offset by higher royalties and tariffs ($69 million) as a result of a higher royalty rate and increased production.

APLNG Corporate / other reduced $21 million reflecting lower costs due to gas inventory movements ($69 million) and a benefit due to adopting AASB 16 *Leases* ($35 million). This was partially offset by the exploration write-offs ($56 million), foreign exchange impacts ($22 million) and corporate costs and other ($5 million).

Capital expenditure - APLNG 100%

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Operated upstream - Sustain	(483)	(515)	32	(6)
Operated upstream - Infrastructure	(83)	(122)	39	(32)
Exploration & Appraisal (E&A)	(88)	(102)	14	(14)
Operated stay in business (SIB)	(63)	(16)	(47)	294
Downstream	(0)	(39)	39	(100)
Non-operated	(205)	(262)	57	(22)
Workovers	-	(237)	237	(100)
Total capital expenditure	**(922)**	**(1,293)**	**371**	**(29)**
Working capital movement	(164)	16	(180)	(1,125)
Leases classified as financing cash flow	48	-	48	n/a
Total capital expenditure per cash flow	**(1,038)**	**(1,277)**	**239**	**(19)**

Capital expenditure decreased by $371 million, of which $237 million relates to workover costs now expensed. The remaining $134 million is driven by a $71 million decrease in operated development costs with completion of the ERIC pipeline, $14 million reduced exploration, $57 million lower non-operated spend due to a reduced level of development activity, $39 million lower downstream spend driven by a $50 million benefit related to settlement of a project construction claim, partially offset by an increase in SIB of $47 million related to purchase of spares for maintenance.

Operated upstream - Sustain includes expenditure for drilling, completions, fracture stimulation, gathering network, surface connection, land access and development infrastructure which occurs over multiple years and is directly related to sustaining production over the medium-term. In FY2020, 260 operated wells were drilled (versus 251 in FY2019) including 239 Surat vertical wells (versus 243 in FY2019). 74 wells were fracture stimulated (versus 91 in FY2019) and 267 wells were brought online (vs 266 in FY2019).

Working capital increased by $164 million primarily due to lower capex creditors as a result of lower activity in FY2020.

6.2.2 Integrated Gas – Other

This segment comprises Origin Integrated Gas activities that are separate from APLNG, and includes unconventional exploration interests in the Beetaloo Basin, the southwest Queensland Cooper-Eromanga Basin and a potential conventional development resource in the offshore Browse Basin. It also includes overhead costs (net of recoveries) incurred as upstream operator and corporate service provider to APLNG, costs associated with growth initiatives such as hydrogen and small scale LNG, and costs incurred in managing Origin's exposure to LNG pricing risk and impacts of LNG trading positions held by Origin.

Beetaloo Basin (Northern Territory)

Origin has a 77.5 per cent interest in three exploration permits over 18,500 km^2 in the Beetaloo Basin. An increase of 7.5 per cent from the previous 70 per cent interest occurred on 7 April 2020, as part of changes to the joint venture agreement with partner Falcon Oil and Gas.

Stage 2 appraisal is underway, targeting two independent shale liquids-rich gas plays. Two horizontal appraisal wells are planned to be drilled, fracture stimulated and put on extended production test, with the objective of flowing liquids-rich gas to the surface. Work continued with the regulators and Native Title holders to ensure operations are conducted safely and with transparency around the necessary approvals and consents.

- **Kyalla liquids-rich gas play** – The Kyalla 117 well has been drilled to a total measured depth of 3,809 metres, which includes a 1,579 metre lateral section. Results obtained to date demonstrate good reservoir continuity, conductive natural fractures and continuous gas shows.

  In March 2020, operations were paused in response to COVID-19 pandemic. The Ensign rig has been secured and maintained locally and by mid-May all activities were completed on the Kyalla 117 well site.

  Subject to COVID-19 related conditions, fracture stimulation of Kyalla 117 is expected to resume in Q3/Q4 calendar year 2020 with extended production testing of the well to follow. Results from the production test are expected by the end of the first quarter of calendar year 2021. These results will inform options to either further evaluate this play or commence activities in the Velkerri play.
- **Velkerri liquids-rich gas play** - Construction of the Velkerri 76 well lease pad was completed in early December 2019 and environmental approval to drill and fracture stimulate the Velkerri Flank well was granted in late December 2019.

Cooper-Eromanga Basin (Queensland)

Origin entered into agreements with Bridgeport Energy to farm into a 75 per cent equity position and operatorship of five permits located in the Cooper-Eromanga Basin in southwest Queensland. Origin was included on title in June 2020 and drilling of the first well (Stage 1A vertical) is due to commence in Q4 calendar year 2020. The staged farm-in work program involves the drilling of up to five exploration wells to be completed by the end of 2024 targeting both unconventional liquids and gas. Origin will carry Bridgeport's cost up to $12 million.

Financial summary

	FY20 ($m)	FY19 ($m)	Change ($m)	Change (%)
Origin only commodity hedging and trading	(92)	(199)	107	(54)
Other Origin only costs	(82)	(32)	(50)	156
Underlying EBITDA	**(174)**	**(231)**	**57**	**(25)**
Underlying depreciation and amortisation/ITDA	(24)	(12)	(12)	99
Interest income - MRCPS	174	226	(52)	(23)
Underlying Profit/(Loss)	**(23)**	**(17)**	**6**	**(35)**

Refer to the table below for a breakdown of Origin only commodity hedging and trading costs.

Other Origin only costs increased $50 million, including a benefit of $11 million from adopting AASB 16 *Leases*. The remaining $61 million increase is primarily driven by costs associated with an agreement to reduce Origin's share of overriding royalty in the Beetaloo Basin ($15 million), a higher proportion of non-recoverable costs, and higher insurance costs.

FY2020 hedging and trading summary

FY2020 hedging and trading positions realised a $92 million loss compared to a $199 million loss in FY2019. Based on open hedge and trading positions at current forward market prices[7], we estimate a net gain on oil hedging and LNG trading in FY2021 of $50 million.

$m	FY19 actual	FY20 actual	FY21 estimate[a]
Hedge premium expense	(34)	(29)	(9)
Gain/(loss) on oil hedging	(81)	8	99
Gain/(loss) on LNG hedging/trading	(84)	(72)	(40)
Total	**(199)**	**(92)**	**50**

[a] Based on forward prices as at 17 August 2020.

Oil hedging

Origin has entered into oil hedging instruments to manage its share of APLNG oil price risk based on the primary principle of protecting the Company's investment grade credit rating and cash flows during volatile market periods.

For FY2021, Origin's share of APLNG related Japan Customs-cleared Crude (JCC) oil price exposure is estimated to be approximately 22 mmboe. As at 31 July 2020, we estimate that 11.4 mmboe has been priced at approximately US$41/bbl before any hedging, based on the contract lags.

Origin has separately hedged 6.4 mmbbl primarily using swaps, producer collars and put options of which 3.7 mmbbl has been realised as at 31 July 2020 at an average price of approximately US$55/bbl (see table below).

Hedge instruments	Realised as at 31 July 2020		Remaining unrealised	
	Volume	Average price	Volume	Average price
Brent AUD swaps	3.1 mmbbl	A$88/bbl	1.3 mmbbl	A$66/bbl
Brent USD swaps	-	-	0.4 mmbbl	US$57/bbl
Brent producer collars	0.4 mmbbl	US$35-90/bbl	0.4 mmbbl	US$35-90/bbl
Brent puts	0.2 mmbbl	US$35/bbl	0.6 mmbbl	US$35/bbl
Total hedged	**3.7 mmbbl**		**2.7 mmbbl**	

LNG hedging and trading

Uncontracted gas volumes produced by APLNG are sold to the domestic and spot LNG markets. To manage price risk associated with LNG spot volumes, Origin entered into forward fixed price hedge contracts with the hedge position fully closed out at a cost of $60 million in FY2020. There are no LNG hedge positions relating to APLNG's uncontracted sales exposure beyond FY2020.

In 2013, Origin established a Henry Hub linked contract to purchase 0.25 mtpa from Cameron LNG for a period of 20 years, with the first cargo delivered to Origin in June 2020. In FY2020, we recognised a non-cash charge of $455 million post-tax relating to an onerous contract provision associated with Cameron LNG. The non-cash charge will be excluded from Underlying Profit in FY2020, with future realised losses or gains accounted for in Underlying Profit. In 2016 Origin established a contract with ENN Energy Trading Company Limited to sell 0.28 mtpa on a Brent oil-linked basis commencing in FY2019 and ending in December 2023. These contracts and derivative hedge contracts that manage the price risk associated with the physical LNG contracts form part of an LNG trading portfolio. We estimate a net loss of $40 million in FY2021 for the combined LNG trading and derivatives portfolio, based on current forward prices[7].

[7] As at 17 August 2020.

7. Risks related to Origin's future financial prospects

The scope of operations and activities means that Origin is exposed to risks that can have a material impact on our future financial prospects. Material risks, and the Company's approach to managing them, are summarised below.

Risk management framework

Overseen by the Board and the Board Risk Committee, Origin's risk management framework supports the identification, management and reporting of material risks. Risks are identified that have the potential to impact the delivery of business plans and objectives. Risks are assessed using a risk toolkit that considers the level of consequence and likelihood of occurrence using consistent risk assessment criteria.

The risk framework incorporates a 'three lines of defence' model for managing risks and controls in areas such as health and safety, environment (including climate change), finance, reputation and brand, legal and compliance and social impacts. All employees are responsible for making risk-based decisions and managing risk within approved risk appetite and specific limits.

The Board reviews Origin's material risks each quarter and assesses the effectiveness of the Company's risk management framework annually in accordance with the ASX Corporate Governance Principles and Recommendations.

Three lines of defence

Line of defence	Responsibility	Primary accountability
First line		
Lines of business	Identifies, assesses, records, prioritises, manages and monitors risks.	Management
Second line		
Oversight functions	Provides the risk management framework, tools and systems to support effective risk management.	Management
Third line		
Internal audit	Provides assurance on the effectiveness of governance, risk management and internal controls.	Board, Board Committees and Management

Our risk framework supports the identification and management of emerging risks and escalating threats. During FY2020, COVID-19 emerged as a key threat to our operational and financial performance, requiring an ongoing response and management across many of our existing material risks to minimise impacts. Our priorities continue to focus on the health and safety of our people, customers and the communities we operate in. We are ensuring continuity of our operations and supporting activities, including our supply chain, to provide our essential services to our customers and maintain our financial resilience in response to changes in global markets.

Material risks

The risks identified in this section have the potential to materially affect Origin's ability to meet its business objectives and impact its future financial prospects. These risks are not exhaustive and are not arranged in order of significance.

Strategic risks

Strategic risks arise from uncertainties that may emerge in the medium to longer term and, while they may not necessarily impact short-term profits, can have an immediate impact on the value of the Company. These Strategic risks are managed through continuous monitoring and review of emerging and escalating risks, ongoing planning and resource allocation, and evaluation by management and the Board.

Risk	Consequences	Management
Competition	Origin operates in a highly competitive retail environment which can result in pressure on margins and customer losses. Competition also impacts Origin's wholesale business, with generators competing for capacity and fuel and the potential for gas markets to be impacted by new domestic gas resources, LNG imports and the volume of gas exports.	> Our strategy to mitigate the impact of this risk on our Retail business is to effectively manage customer lifetime value and build customer loyalty and trust by delivering simple, seamless and personalised customer experiences, and offering innovative and differentiated products and services. Partnering with Octopus Energy, with its proven technology, should drive a differentiated, market leading customer experience. > We endeavour to mitigate the impact of this risk on our wholesale business by sourcing competitively priced fuel to operate our generation fleet and through efficient operations optimising flexibility in our fuel, transportation and generation portfolio.
Technological developments / disruption	Distributed generation is empowering consumers to own, generate and store electricity, consuming less energy from the grid. Technology is allowing consumers to understand and manage their power usage through smart appliances, having the potential to disrupt the existing utility relationship with consumers. Technology also allows customers to have increased awareness of the impact of when they consume energy and where that energy may be sourced from. Advances in technology and the abundance of low-cost data acquisition, communication and control has the potential to create new business models and introduce new competitors.	> Origin actively monitors and participates in technological developments through local and global start-up accelerator programs, trialling new energy technology and exploring investments in new products or business models. > In parallel, Origin is growing its distributed generation and home energy services businesses. It is working to mitigate the impact of this risk on its core energy businesses by offering superior service and innovative products and reducing cost to serve.
Changes in demand for energy	Any decrease in energy demand driven by price, consumer behaviour, mandatory energy efficiency schemes, government policy, weather or other factors can reduce Origin's revenues and adversely affect Origin's future financial performance. Conversely, failure to adequately prepare for any increases in future energy demands, including the emergence of new sources of demand, may restrict Origin in optimising our future financial opportunities.	> Origin is partially mitigating the impact of this risk by applying advanced data analytics capability to smart meter data to better predict customer demand and enable Origin to develop data-based customer propositions. > Our strategy of growing our gas reserves, increasing our supply of renewables, and investing in new technology supports Origin's ability to meet future increases in energy demand.
Regulatory policy	Origin has broad exposure to regulatory policy change and other government interventions. Changes in these areas can impact financial outcomes and, in some cases, change the commercial viability of existing or proposed projects or operations. Specific areas subject to review and development include government subsidies for	> Origin contributes to the policy process at federal, state and territory governments by actively participating in public policy debate, proactively engaging with policy makers and participating in public forums, industry associations, think tanks and research.

	building new generation or transmission capacity, direct government investment in generation, energy market design, climate change policies, domestic gas market interventions, retail price and consumer protection regulation, and royalties and taxation policy.	> Origin advocates directly with key members of governments, opposition parties and bureaucrats to achieve sound policy outcomes aligned with our commercial objectives. Origin also makes formal submissions to relevant government policy inquiries. > Origin actively promotes the customer and economic benefits publicly that flow from our activities in deregulated energy markets.
Climate change	Climate change impacts many parts of Origin's business. Key risks and opportunities include: • Those related to the transition to a low-carbon economy, such as the ongoing decarbonisation of energy markets, decreased demand for fossil fuels in some markets, reduced lifespan of carbon-intensive assets, changes to energy market dynamics caused by the intermittency of renewables, changing government regulation and climate change policy and community demand for lower-carbon sources of energy; and • Those related to the physical impact of a changing climate, including the impact of changing weather patterns on the demand for energy, and the resilience of our assets to changing and more severe weather conditions There is also increased risk of climate change related litigation against Origin and/or regulatory bodies that grant licences or approvals to Origin which could potentially result in more onerous licence/approval conditions, non-renewal of licences/approvals or other adverse consequences.	> Our strategy for transitioning to a carbon constrained future is focused on growth in renewables, gas and cleaner, smarter customer solutions. For Energy Markets, Origin has prepared for a range of decarbonisation scenarios including scenarios consistent with the Paris Agreement's goal of holding the rise in global temperatures to a 50 per cent chance of below 1.5°C. > Origin has committed to significantly growing its supply of renewable generation, including 1,200 MW of committed large scale solar and wind energy since March 2016. > Origin uses the flexibility in its gas supply and peaking generation capacity to manage the intermittency of renewables. > Origin is using the framework recommended by the Financial Stability Board's Taskforce on Climate-related Financial Disclosures (TCFD) for governance oversight and reporting of our climate change risks. > Origin has committed to science-based targets to halve Scope 1 and 2 greenhouse gas emissions and reducing value chain Scope 3 emission[8] by 25 per cent by 2032. > Origin is planning to update its existing science-based targets to a 1.5°C pathway with an aim to achieve net zero emissions by 2050. > Origin has committed to a new short-term emissions target to reduce Scope 1 emissions by 10 per cent on average over FY2021-23 from a FY2017 baseline.

[8] Incurred within the domestic market; excluding LPG and corporate as their emissions are not material.

Financial risks

Financial risks are the risks that directly impact the financial performance and resilience of Origin.

Risk	Consequences	Management
Commodity	Origin has a long-term exposure to international oil, LNG and gas prices through the sale and purchase of domestic gas, LNG and LPG, and its investment in APLNG. Pricing can be volatile and downward price movements can impact cash flow, financial performance, reserves and asset carrying values. Some of Origin's long-term domestic gas purchase agreements and APLNG's LNG sale agreements contain periodic price reviews. Following each review, pricing may be adjusted upwards or downwards, or it may remain unchanged. Prices and volumes for electricity that Origin sources to on-sell to customers are volatile and are influenced by many factors that are difficult to predict. Long-term fluctuations in coal and gas prices also impact the margins of Origin's generation portfolio.	> Commodity exposure limits are set by the Board to manage the overall financial exposure that Origin is prepared to take. > Origin's commodity risk management process monitors and reports performance against defined limits. > Commodity price risk is managed through a combination of physical positions and derivatives contracts. > For each periodic price review, a negotiation strategy is developed, which takes into account external market advice and uses both external and in-house expertise.
Foreign exchange and interest rates	Origin has exposures through principal debt and interest payments associated with foreign currency and Australian dollar borrowings, the sale and purchase of gas, LNG and LPG, and through its investments in APLNG and the Company's other foreign operations. Interest rate and foreign exchange movements could lead to a decrease in Australian dollar revenues or increased payments in Australian dollar terms.	> Risk limits are set by the Board to manage the overall exposure. > Origin's treasury risk management process monitors and reports performance against defined limits. > Foreign exchange and interest rate risks are managed through a combination of physical positions and derivatives.
Liquidity and access to capital markets	Origin's business, prospects and financial flexibility could be adversely affected by a failure to appropriately manage its liquidity position, or if markets are not available at the time of any financing or refinancing requirement.	> Origin actively manages its liquidity position through cash flow forecasting and maintenance of minimum levels of liquidity as determined under Board approved limits.
Credit and counterparty	Some counterparties may fail to fulfil their obligations (in whole or part) under major contracts.	> Counterparty risk assessments are regularly undertaken and, where appropriate, credit support is obtained to manage counterparty risk.

Operational risks

Operational risks arise from inadequate or failed internal processes, people or systems or from external events.

Risk	Consequences	Management
Safe and reliable operations	Origin has exposure to reliability or major accident events that may impact our licence to operate or financial prospects. This includes loss of containment, cyber-attack and security incidents, unsafe operations, and natural hazards, events that may result in harm to our people, environmental damage, additional costs, production loss, third party impacts, and impact to our reputation.	> Core operations are subject to a comprehensive framework of controls and operational performance monitoring to manage the design, operational and technical integrity of our assets and associated operational activities. Origin's standards and controls are designed to ensure we meet regulatory and industry

	A production outage or constraint, network or IT systems outage, would affect Origin's ability to deliver electricity and gas to its customers. A serious incident or a prolonged outage may also damage Origin's financial prospects and reputation.	standards in all operations. > Origin personnel are appropriately trained and licensed to perform their operational activities. > Origin maintains an extensive insurance program to mitigate consequences by transferring financial risk exposure to third parties, where commercially appropriate.
Environmental and Social	An environmental incident or Origin's failure to consider and adequately mitigate the environmental, social and socio-economic impacts on communities and the environment has the potential to cause environmental impact, community action, regulatory intervention, legal action, reduced access to resources and markets, impacts to Origin's reputation and increased operating costs. Community concerns regarding environmental and social impacts associated with our activities may also give rise to unrest among community stakeholder groups and activists which may impact the company's reputation. A third party's actions may also result in delays in Origin carrying out its approved development and operational activities. NGOs, landholders, community members and other affected parties can seek to prevent or delay Origin's activities through court litigation, preventing access to land and extending approval pathway timeframes.	> Origin engages with communities to understand, mitigate and report on environmental and social risks associated with its projects and operations. > At a minimum, the management of environmental and social risks meets regulatory requirements. Where practical, their management extends to the improvement of environmental values and the creation of socio-economic benefits. > A dedicated Board Committee oversees health, safety and environment risk. The Committee receives regular reporting of the highest rated environmental risks and mitigants, and reviews significant incidents and near misses. > Origin engages with its stakeholders prior to seeking relevant approvals for its development and operational activities, and this engagement continues through the life of the project and during operations.
Cyber security	A cyber security incident could lead to a breach of privacy, loss of and/or corruption of commercially sensitive data, and/or a disruption of critical business processes. This may adversely impact customers and the Company's business activities.	> A dedicated cyber risk team is responsible for implementing a Board-approved cyber strategy and continuously improving controls. > External cyber security specialists are regularly employed to assess our cyber security profile, including penetration testing. > Employees undertake compulsory cyber awareness training, including how to identify phishing emails and keep data safe; and are subject to a regular program of random testing.

APLNG gas reserves, resources and deliverability	There is uncertainty about the productivity, and therefore economic viability, of resources and developed and undeveloped reserves. As a result, there is a risk that actual production may vary from that estimated, and in the longer term, that there will be insufficient reserves to supply the full duration and volumes to meet contractual commitments. As at 30 June 2020 APLNG's total resources are estimated to be greater than its contractual supply commitments on a volume basis. However, under certain scenarios of production and deliverability of gas over time, there is a risk that the rate of gas delivery required to meet APLNG's committed gas supply agreements may not be able to be met for the later years in the life of existing contracts.	> APLNG employs established industry procedures to identify and consider areas for exploration to mature contingent and prospective resources. > APLNG monitors reservoir performance and adjusts development plans accordingly. APLNG continually takes steps to further strengthen the supply base such as lowering costs and identifying new plays. > APLNG is progressing an exploration campaign that if successful, could increase long-term supply. > APLNG continues to review business development opportunities for long-term gas supply, and has the ability to substitute gas or LNG to meet contractual requirements if required.
Conduct	Unlawful, unethical or inappropriate conduct that falls short of community expectations could result in penalties, reputational/brand damage, loss of customers and adverse financial impacts. Origin's financial prospects and reputation/brand are underpinned by complying with laws and other regulatory obligations (such as privacy, competition and insider trading) and meeting stakeholder commitments.	> Origin's people are trained on the laws and regulations that apply to their activities and operations, and on the processes that underpin compliance with laws and regulations. > Origin's Purpose, Values, Behaviours and Code of Conduct guide conduct and decision making across Origin. > All Origin's people are trained every two years in Origin's Code of Conduct, and we conduct training for insider trading, privacy and competition and consumer law every year. > Conduct risk and compliance are identified as material risks within Origin's risk management framework and are regularly reported to the Board Risk Committee. Business units are accountable for controls specific to the different parts of Origin's business and are subject to assurance activities, including Internal Audit.
Joint venture	Third party joint venture operators may have economic or other business interests that are inconsistent with Origin's own and may take actions contrary to the Company's objectives, interests or standards. This may lead to potential financial, reputational and environmental damage in the event of a serious incident.	> Origin applies a number of governance and management standards across its various joint venture interests to provide a consistent approach to managing them. > Origin actively monitors and participates in its joint ventures through participation in their respective boards and governance committees.

APLNG reversion

In 2002, APLNG acquired various CSG interests from Tri-Star that are subject to reversionary rights and an ongoing royalty in favour of Tri-Star. If triggered, the reversionary rights require APLNG to transfer back to Tri-Star a 45 per cent interest in those CSG interests for no additional consideration. The reversion trigger will occur when the revenue from the sale of petroleum from those CSG interests, plus any other revenue derived from or in connection with those CSG interests, exceeds the aggregate of all expenditure relating to those CSG interests plus interest on that expenditure, royalty payments and the original acquisition price.

The affected CSG interests represent approximately 19 per cent of APLNG's 3P CSG reserves (as at 30 June 2020), and approximately 20 per cent of APLNG's 2P CSG reserves (as at 30 June 2020).

Tri-Star served proceedings on APLNG in 2015 ('reversion proceeding') claiming that reversion occurred as early as 1 November 2008 following ConocoPhillips' investment in APLNG, on the assertion that the equity subscription monies paid by ConocoPhillips, or a portion of them, was revenue for purposes of the reversion trigger. Tri-Star has also claimed in the alternative that reversion occurred in 2011 or 2012 following Sinopec's investment in APLNG. These claims are referred to in this document as Tri-Star's 'past reversion' claims.

Tri-Star has made other claims in the reversion proceeding against APLNG including by a further amended statement of claim filed by Tri-Star with the leave of the court in September 2019. These relate to other aspects of the reversion trigger (including as to the calculation of interest, calculation of revenue and the nature and quantum of APLNG's expenditures that can be included), the calculation of the royalty payable by APLNG to Tri-Star, rights in respect of infrastructure, and claims relating to gas sold by APLNG following the alleged reversion dates.

APLNG denies these claims and filed its initial defence and counter-claim in April 2016. APLNG filed its amended defence and counter-claim (responding to Tri-Star's September 2019 amended statement of claim) in May 2020.

If Tri-Star's past reversion claims are successful, then Tri-Star may be entitled to an order that reversion occurred as early as 1 November 2008. If the court determines that reversion has occurred, then APLNG may no longer have access to the reserves and resources that are subject to Tri-Star's reversionary interests and may need to source alternative supplies of gas (including from third parties) to meet its contracted commitments. There are also likely to be a number of further complex issues that would need to be resolved as a consequence of any such finding in favour of Tri-Star. These matters will need to be determined by the court (either in the current or in separate proceedings) or by agreement between the parties, and they include:

- the terms under which some of the affected CSG interests will be operated where currently there are no joint operating agreements in place;
- the amount of Tri-Star's contribution to the costs incurred by APLNG in exploring and developing the affected CSG interests between the date of reversion and the date of judgment, which APLNG has stated in its defence and counter-claim are in the order of $4.56 billion (as at 31 December 2019) if reversion occurred on 1 November 2008;
- the consequences of APLNG having dealt with Tri-Star's reversionary interests between the date of reversion and the date of judgment, including the gas produced from them. Tri-Star has:
  - estimated the value of such gas which it has been unable to take since the alleged reversion, calculated by reference to the sale of gas as LNG and gas to domestic customers, to be approximately $3.37 billion (as at 31 March 2019) and approximately $1.3 billion per annum thereafter. In the alternative, Tri-Star claims that the value of such gas should be assessed by reference to the revenue derived by APLNG or its affiliates from LNG sales since the alleged reversion, being approximately $2.5 billion, (as at March 2019), or $2.4 billion (as at March 2019) if the proceeds from sale of LNG is determined to be calculated net of liquefaction costs; and
  - alleged that it should be paid the value of such gas or is otherwise entitled to set-off the value of such gas from any amount owing to APLNG arising from APLNG's counter-claim for contribution to the costs incurred by APLNG in exploring and developing the affected CSG interests between the date of reversion and the date of judgment; and
- if reversion occurred:
  - the extent of the reversionary interests principally with respect to Tri-Star's ownership and/or rights to use or access certain project infrastructure; and

- the repayment by Tri-Star of the ongoing royalty which has been paid by APLNG since reversion, as a result of its mistake as to the occurrence of the reversion trigger.

If APLNG is successful in defending Tri-Star's past reversion claims in the reversion proceeding, the potential for reversion to otherwise occur in the future in accordance with the reversion trigger will remain.

Tri-Star has also commenced proceedings against APLNG ('markets proceeding') which allege that APLNG breached three CSG joint operating agreements by failing to offer Tri-Star (and the other minority participants in those agreements) an opportunity to participate in the "markets" alleged to be constituted by certain of its LNG and domestic gas sales agreements, including the Sinopec and Kansai LNG sale agreements entered into by APLNG in 2011 and 2012. Tri-Star has alleged that it should have been offered participation in those sales agreements for its share of production from those three CSG joint ventures referable to both its small participating interests and its reversionary interests in those joint ventures. Tri-Star is seeking, amongst other things, damages and/or an order that APLNG offer Tri-Star (and the other minority participants in those CSG joint operating agreements) the opportunity to participate in those sales agreements for their proportionate share of production from those three CSG joint ventures.

In September 2019, Tri-Star, with the leave of the court, filed a further amended statement of claim in the markets proceeding. Tri-Star has in its amended statement of claim, sought additional relief in respect of:

- the nature and scope of the obligations of APLNG as operator pursuant to the CSG joint operating agreements;
- Tri-Star's ownership and/or rights to use or access certain project infrastructure; and
- APLNG's entitlement as operator to charge (both historically and in the future) certain categories of costs under the relevant CSG joint operating agreements.

APLNG intends to defend the claims in both proceedings. APLNG filed its defence and counter-claim in the markets proceedings (responding to Tri-Star's September 2019 amended statement of claim) in April 2020.

Tri-Star is required to file its:

- amended reply and answer in the reversion proceeding by 30 November 2020; and
- reply and answer in the markets proceeding by 18 December 2020.

Once the pleadings have closed, the usual court process would involve a period of document disclosure, potentially court-ordered mediation and then finally a hearing. The timing for each of these steps is difficult to predict at this stage. APLNG expects that the two proceedings will be managed in parallel.

If APLNG is not successful in defending all or some of the claims being made in the proceedings by Tri-Star, APLNG's financial performance may be materially adversely impacted and the amount and timing of cash flows from APLNG to its shareholders, including Origin, may be significantly affected.

8. Important information

Forward looking statements

This Operating and Financial Review (OFR) contains forward looking statements, including statements of current intention, statements of opinion and predictions as to possible future events and future financial prospects. Such statements are not statements of fact and there can be no certainty of outcome in relation to the matters to which the statements relate. Forward looking statements involve known and unknown risks, uncertainties, assumptions and other important factors that could cause the actual outcomes to be materially different from the events or results expressed or implied by such statements, and the outcomes are not all within the control of Origin. Statements about past performance are not necessarily indicative of future performance.

Neither the Company nor any of its subsidiaries, affiliates and associated companies (or any of their respective officers, employees or agents) (the 'Relevant Persons') makes any 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. The forward looking statements in this OFR reflect views held only at the date of this report and except as required by applicable law or the ASX Listing Rules, the Relevant Persons disclaim 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 future events.

Non-IFRS financial measures

This OFR and Directors' Report refers to Origin's financial results, including Origin's Statutory Profit and Underlying Profit. Origin's Statutory Profit contains a number of items that when excluded provide a different perspective on the financial and operational performance of the business. Income Statement amounts, presented on an underlying basis such as Underlying Profit, are non-IFRS financial measures, and exclude the impact of these items consistent with the manner in which senior management reviews the financial and operating performance of the business. Each underlying measure disclosed has been adjusted to remove the impact of these items on a consistent basis. A reconciliation and description of the items that contribute to the difference between Statutory Profit and Underlying Profit is provided in Section 5.1 of this OFR.

Certain other non-IFRS financial measures are also included in this OFR. These non-IFRS financial measures are used internally by management to assess the performance of Origin's business and make decisions on allocation of resources. Further information regarding the non-IFRS financial measures is included in the Glossary of this OFR. Non-IFRS financial measures have not been subject to audit or review. Certain comparative amounts from the prior corresponding period have been re-presented to conform to the current period's presentation.

Appendices

Appendix 1: FY2020 impact of leasing standard

AASB 16 *Leases* has been adopted from 1 July 2019. The effect of this standard is to bring Origin's leases, primarily commercial offices, LPG terminals, power generating assets and fleet vehicles, on to the balance sheet.

A lease liability of $514 million and a right-of-use (ROU) asset of $467 million have been recognised in the balance sheet at 30 June 2020. In the profit and loss, the ROU asset is depreciated and interest expense is recognised on the lease liability. Previously lease payments were expensed within Underlying EBITDA. In the cash flow, lease payments are recognised as financing cash flows, split between principal and interest payments. Previously lease payments were classified as operating cash flows.

Renewable power purchase agreement (PPA) treatment
A net derivative liability of $512 million associated with Origin's renewable PPAs, previously accounted for as financial instruments and fair valued, has been judged to meet the lease definition under AASB 16 *Leases* and so has been declassified as a financial instrument. However, due to the variable nature of the payments, the lease liability and ROU asset are recognised at nil value and payments continue to be recognised as operating costs.

There has been no change to comparative information. Refer to the Overview section of the Origin Energy Financial Statements for further information.

The below table removes the impact of AASB 16 *Leases* from Origin's FY2020 Profit and Loss for comparative purposes.

	FY20 Reported ($m)	Lease adj ($m)	FY20 excl lease adj ($m)	FY19 Reported ($m)	Change ($m)	Change (%)
Energy Markets	1,459	(62)[a]	1,397	1,574	(177)	(11)
Integrated Gas - Share of APLNG	1,915	(13)	1,902	2,123	(221)	(10)
Integrated Gas - Other	(174)	(11)	(185)	(231)	46	(20)
Corporate	(59)	(11)	(70)	(234)	164	(70)
Underlying EBITDA	**3,141**	**(97)**	**3,044**	**3,232**	**(188)**	**(6)**
Underlying depreciation and amortisation	(509)	80	(429)	(419)	(10)	2
Underlying share of ITDA	(1,303)	22	(1,281)	(1,504)	223	(15)
Underlying EBIT	**1,329**	**5**	**1,334**	**1,308**	**26**	**2**
Underlying interest income - MRCPS	174	-	174	226	(52)	(23)
Underlying net financing costs - other	(300)	18	(282)	(380)	98	(26)
Underlying Profit before income tax and non-controlling interests	**1,203**	**22**	**1,225**	**1,154**	**71**	**6**
Underlying income tax expense	(177)	(4)	(181)	(123)	(58)	47
Non-controlling interests' share of Underlying Profit	(3)	-	(3)	(3)	-	-
Underlying Profit	**1,023**	**18**	**1,041**	**1,028**	**13**	**1**
Operating cash flow	951	91	1,042	1,325	(283)	(21)
Investing cash flow	862	-	862	589	273	46
Financing cash flow	(2,118)	(91)	(2,209)	(520)	(1,689)	325

[a] LPG ($30 million), Cost to serve ($25 million), Solar and Energy Services ($3 million) and Electricity ($4 million).

Appendix 2: FY2020 dewatering and workover treatment – APLNG 100%

From 1 July 2019, APLNG dewatering and workover costs have been expensed rather than capitalised and amortised. Following a period of embedding steady state operations, these costs are considered ongoing and operational in nature going forward, the change in application of accounting practice reflects this. During commissioning of the project and in the lead up to steady state operations, these amounts were capitalised as they represented costs incurred to bring the assets into their intended state of use.

From 1 July 2019, dewatering and workover costs are recognised in the Income Statement as operating expenses within Underlying EBITDA. Previously, future downhole costs for dewatering and workovers were estimated and amortised on a units of production basis. In the cash flow, dewatering and workover costs are recognised within operating cash flow, previously recognised as capital expenditure within investing cash flows.

There has been no change to comparative information. The following table shows FY2019 profit and loss with the treatment change for comparative purposes only.

	FY20 Reported ($m)	FY19 Reported ($m)	Dewatering workover adjustment ($m)	FY19 Adjusted ($m)	Change ($m)	Change (%)
Commodity and other revenue	7,100	7,443	-	7,443	(343)	(5)
Operating expenses[(a)]	(1,992)	(1,781)	(338)	(2,119)	127	(6)
Underlying EBITDA	**5,108**	**5,662**	**(338)**	**5,324**	**(216)**	**(4)**
Depreciation and amortisation	(1,863)	(2,116)	406	(1,710)	(153)	9
Net financing costs	(897)	(1,213)	-	(1,213)	316	(26)
Income tax expense	(708)	(699)	(21)	(720)	12	(2)
Underlying ITDA from APLNG	**(3,468)**	**(4,027)**	**385**	**(3,642)**	**174**	**(5)**
Underlying Profit	**1,640**	**1,635**	**47**	**1,682**	**(42)**	**(2)**
Operating cash flow	5,242	5,536	(338)	5,198	44	1
Investing cash flow	(1,229)	(1,258)	338	(920)	(309)	34
Financing cash flow	(4,655)	(4,004)	-	(4,004)	(651)	16

[(a)] Adjustment comprises workover costs of $237 million and dewatering costs of $101 million in FY2019.

Glossary and interpretation

Statutory financial measures

Statutory financial measures are measures included in the Financial Statements for the Origin Consolidated Group, which are measured and disclosed in accordance with applicable Australian Accounting Standards. Statutory financial measures also include measures that have been directly calculated from, or disaggregated directly from financial information included in the Financial Statements for the Origin Consolidated Group.

Term	Meaning
Cash flows from investing activities	Statutory cash flows from investing activities as disclosed in the Statement of Cash Flows in the Origin Consolidated Financial Statements.
Cash flows from operating activities	Statutory cash flows from operating activities as disclosed in the Statement of Cash Flows in the Origin Consolidated Financial Statements.
Cash flows used in financing activities	Statutory cash flows used in financing activities as disclosed in the Statement of Cash Flows in the Origin Consolidated Financial Statements.
Net Debt	Total current and non-current interest-bearing liabilities only, less cash and cash equivalents excluding cash to fund APLNG day-to-day operations.
Non-controlling interest	Economic interest in a controlled entity of the consolidated entity that is not held by the Parent entity or a controlled entity of the consolidated entity.
Statutory Profit/Loss	Net profit/loss after tax and non-controlling interests as disclosed in the Income Statement in the Origin Consolidated Financial Statements.
Statutory earnings per share	Statutory Profit/Loss divided by weighted average number of shares as disclosed in the Income Statement in the Origin Consolidated Financial Statements.

Non-IFRS financial measures

Non-IFRS financial measures are defined as financial measures that are presented other than in accordance with all relevant Accounting Standards. Non-IFRS financial measures are used internally by management to assess the performance of Origin's business, and to make decisions on allocation of resources. The Non-IFRS financial measures have been derived from Statutory financial measures included in the Origin Consolidated Financial Statements, and are provided in this report, along with the Statutory financial measures to enable further insight and a different perspective into the financial performance, including profit and loss and cash flow outcomes, of the Origin business.

The principal non-IFRS profit and loss measure of Underlying Profit has been reconciled to Statutory Profit in Section 5.1. The key Non-IFRS financial measures included in this report are defined below.

Term	Meaning
AASB	Australian Accounting Standards Board
Adjusted Net Debt	Net Debt adjusted to remove fair value adjustments on hedged borrowings
Adjusted Underlying EBITDA	Origin Underlying EBITDA – Share of APLNG Underlying EBITDA + net cash from APLNG over the relevant 12 month period.
Average interest rate	Interest expense divided by Origin's average drawn debt during the period.
cps	Cents per share.
Free Cash Flow	Net cash from operating and investing activities (excluding major growth projects), less interest paid.
FY20 (Current period)	Year ended 30 June 2020.
FY19 (Prior period)	Year ended 30 June 2019.
Gearing	Adjusted Net Debt / (Adjusted Net Debt + Total equity)
Gross Profit	Revenue less cost of goods sold.
Items excluded from Underlying Profit (IEUP)	Items that do not align with the manner in which the Chief Executive Officer reviews the financial and operating performance of the business which are excluded from Underlying Profit. See Section 5.1 for details.
MRCPS	Mandatorily Redeemable Cumulative Preference Shares.

Term	Meaning
Non-cash fair value uplift	Reflects the impact of the accounting uplift in the asset base of APLNG which was recorded on creation of APLNG and subsequent share issues to Sinopec. This balance will be depreciated in APLNG's Income Statement on an ongoing basis and, therefore, a dilution adjustment is made to remove this depreciation.
Share of ITDA	Origin's share of equity accounted interest, tax, depreciation and amortisation.
Total Segment Revenue	Total revenue for the Energy Markets, Integrated Gas and Corporate segments, as disclosed in note A1 of the Origin Consolidated Financial Statements.
Underlying EPS	Underlying Profit/Loss divided by weighted average number of shares.
Underlying EBITDA	Underlying earnings before underlying interest, underlying tax, underlying depreciation and amortisation (EBITDA) as disclosed in note A1 of the Origin Consolidated Financial Statements.
Underlying share of ITDA	Share of interest, tax, depreciation and amortisation of equity accounted investees adjusted for items excluded from Underlying Profit.
Underlying Profit/Loss	Underlying net profit/loss after tax and non-controlling interests as disclosed in note A1 of the Origin Consolidated Financial Statements.
Underlying ROCE (Return on Capital Employed)	Calculated as Adjusted EBIT / Average Capital Employed. Average Capital Employed = Shareholders Equity + Origin Debt + Origin's Share of APLNG project finance - Non-cash fair value uplift + net derivative liabilities. The average is a simple average of opening and closing in any 12 month period. Adjusted EBIT = Origin Underlying EBIT and Origin's share of APLNG Underlying EBIT + Dilution Adjustment = Statutory Origin EBIT adjusted to remove the following items: a) Items excluded from underlying earnings; b) Origin's share of APLNG underlying interest and tax; and c) the depreciation of the Non-cash fair value uplift adjustment. In contrast, for remuneration purposes Origin's statutory EBIT is adjusted to remove Origin's share of APLNG statutory interest and tax (which is included in Origin's reported EBIT) and certain items excluded from underlying earnings. Gains and losses on disposals and impairments will only be excluded subject to Board discretion.

Non-financial terms

Term	Meaning
1P reserves	Proved Reserves are those reserves which analysis of geological and engineering data can be estimated with reasonable certainty to be commercially recoverable. There should be at least a 90 per cent probability that the quantities actually recovered will equal or exceed the estimate.
2P reserves	The sum of Proved plus Probable Reserves. Probable Reserves are those additional reserves which analysis of geological and engineering data indicate are less likely to be recovered than Proved Reserves but more certain than Possible Reserves. There should be at least a 50 per cent possibility that the quantities actually recovered will equal or exceed the best estimate of Proved plus Probable Reserves (2P).
3P reserves	Proved plus Probable plus Possible Reserves. Possible Reserves are those additional Reserves which analysis of geological and engineering data suggest are less likely to be recoverable than Probable Reserves. The total quantities ultimately recovered from the project have at least a 10 per cent probability of exceeding the sum of Proved plus Probable plus Possible (3P), which is equivalent to the high estimate scenario.
2C resources	The best estimate quantity of petroleum estimated to be potentially recoverable from known accumulations by application of development oil and gas projects, but which are not currently considered to be commercially recoverable due to one or more contingencies. The total quantities ultimately recovered from the project have at least a 50 per cent probability to equal or exceed the best estimate for 2C contingent resources.
Boe	Barrel of oil equivalent
C&I	Commercial and Industrial

Term	Meaning
DMO	Default Market Offer
ERP	Enterprise resource planning
GJ	Gigajoule = 109 joules
JCC	Japan Customs-cleared Crude (JCC) is the average price of crude oil imported to Japan. APLNG's long-term LNG sales contracts are priced based on the JCC index.
Joule	Primary measure of energy in the metric system.
Kansai	When referring to the off-taker under the LNG Sale and Purchase Agreement (SPA) with APLNG, means Kansai Electric Power Co. Inc.
kT	kilo tonnes = 1,000 tonnes
Mtpa	Million tonnes per annum
MW	Megawatt = 106 watts
MWh	Megawatt hour = 103 kilowatt hours
NEM	National Electricity Market
NPS	Net Promoter Score (NPS) is a measure of customers' propensity to recommend Origin to friends and family
PJ	Petajoule = 1015 joules
PJe	Petajoules equivalent = an energy measurement used to represent the equivalent energy in different products so the amount of energy contained in these products can be compared.
PPA	Power Purchase Agreement
Scope 1 emissions	Direct emission from sources that are owned or operated by Origin, in particular electricity generation and gas development
Scope 2 emissions	Emissions from the electricity that we consume to power our offices and operating sites
Scope 3 emissions	Indirect emissions, other than Scope 2, relating to Origin's value chain that we do not own or control, including wholesale purchases of electricity from the NEM. LPG and corporate Scope 3 emissions are excluded as their emissions are not material
Sinopec	When referring to the off-taker under the LNG Sale and Purchase Agreement (SPA) with APLNG, means China Petroleum & Chemical Corporation which has appointed its subsidiary Unipec Asia Co. Ltd. to act on its behalf under the LNG SPA.
SME	Small Medium Enterprise
TRIFR	Total Recordable Incident Frequency Rate
TW	Terawatt = 1,012 watts
TWh	Terawatt hour = 109 kilowatt hours
VDO	Victorian Default Offer
Watt	A measure of power when a one ampere of current flows under one volt of pressure.

Interpretation

All comparable results reflect a comparison between the current period and the prior period, unless otherwise stated.

A reference to APLNG or Australia Pacific LNG is a reference to Australia Pacific LNG Pty Limited in which Origin holds a 37.5 per cent shareholding. A reference to Octopus Energy or Octopus is a reference to Octopus Energy Holdings Limited in which Origin holds a 20% shareholding. Origin's shareholding in APLNG and Octopus Energy is equity accounted.

A reference to $ is a reference to Australian dollars unless specifically marked otherwise.

All references to debt are a reference to interest bearing debt only.

Individual items and totals are rounded to the nearest appropriate number or decimal. Some totals may not add due to rounding of individual components.

When calculating a percentage change, a positive or negative percentage change denotes the mathematical movement in the underlying metric, rather than a positive or a detrimental impact. Percentage changes on measures for which the numbers change from negative to positive, or vice versa, are labelled as not applicable.

Remuneration Report

The Remuneration Report (Report) for the year ended 30 June 2020 (FY2020) forms part of the Directors' Report. It has been prepared in accordance with the *Corporations Act 2001* (Cth) (the Act) and Accounting Standards, and audited as required by section 308(3C) of the Act.

Letter from the Chairman of the Remuneration and People Committee

On behalf of the Remuneration and People Committee (RPC) and the Board, I am pleased to present the Remuneration Report for FY2020.

FY2020 remuneration outcomes

Remuneration outcomes for FY2020 reflected a continued improvement in operational performance notwithstanding the challenging external environment due to the COVID-19 pandemic and its associated economic impacts, including a decline in commodity prices.

The Short Term Incentive (STI) scorecard outcomes for the year reflected above-target results and in some metrics approached stretch targets. The CEO's STI outcome was 83.5 per cent of maximum (FY2019: 68.2 per cent) and the aggregate STI outcome for Executive Key Management Personnel (KMP) was 84.1 per cent of maximum (FY2019: 73.7 per cent).

No awards vested under the Long Term Incentive (LTI) Plan during the year. A partial vesting of FY2017 LTI awards is expected in FY2021.

When STI targets were set at the beginning of FY2020, the Company could not have foreseen the challenges that arose from a severe bushfire season and the COVID-19 pandemic. Yet the targets were met or exceeded even as the executive team managed a rapid and effective response, maintaining energy supplies and supporting impacted customers; safeguarding employees and communities; and working collaboratively with all levels of government to support policy objectives.

During these challenges, our executive team was not distracted from achieving strong operational performance. Our Engagement Score rose to the top quartile with a record high result of 75. Safety outcomes improved by 40 per cent as measured by the Total Recordable Injury Frequency Rate (TRIFR). Our people's safety is our primary focus and we continue to strive for zero harm. Over the year, we also recorded our highest-ever customer Strategic Net Promoter Score (sNPS) and reputation (RepTrak) measures. All areas of STI performance exceeded expectations and enabled Origin to maintain its dividends for shareholders.

Given the challenging economic and business circumstances, the annual remuneration review – which would have been conducted at the end of FY2020 for employees generally as well as Executive KMP – was deferred on a Company-wide basis.

FY2020 remuneration framework

There were no changes to the basic architecture of the remuneration framework during the year. We:

- strengthened and formalised processes that ensure alignment with our purpose, strategy, values and behaviours, enhancing the behavioural assessment mechanism to bring additional rigour to the process for modifying STI scorecard outcomes up or down based on the individual's approach and behaviour;
- reweighted STI metrics towards those influenced by management, which align with long-term decision making and lead to increased shareholder value (see Section 4.2 for details);
- ensured financial and non-financial risks were systematically considered in the overall assessment of STI outcomes; and
- took into account formal feedback from the Chairs of the Health, Safety and Environment (HSE), Risk, Audit and RPC committees in determining and approving final performance outcomes for Executive KMP.

There were no changes to the structure of Non-executive Director (NED) fees.

FY2020 remuneration levels

As foreshadowed in the 2019 Remuneration Report, increases in Executive KMP Fixed Remuneration (FR) at the beginning of FY2020 averaged 1.9 per cent compared with approximately 2.4 per cent for the broader organisation.

During FY2020, we reviewed benchmarking for our three operational Executive General Managers (EGM Energy Supply & Operations, EGM Integrated Gas and EGM Retail) to reflect changes in the scope and complexity of their roles. Our policy is to have key talent remunerated at the median of comparable roles after three years, subject to performance. The final phase of that process was completed during the year, incorporating the revised benchmarking, and all Executive KMP - except the Chief Executive Officer (CEO), see below - are now remunerated in line with this policy. Some of the Executive KMP moved to a 60 per cent STI deferral level during the year.

There were no changes to the policy for NED fees for FY2020.

FY2021 remuneration

As noted, the Company's general annual remuneration review due to be conducted at the end of FY2020 was deferred, and no standard uplifts will occur early in FY2021 for employees generally or for the CEO or Executive KMP.

In the normal course of events the Board would have considered adjusting the CEO's remuneration for FY2021 in order to close the policy gap referred to above. However, the CEO asked, and the Board has agreed, to defer consideration of his remuneration for another year. The Board considered this request very carefully in the light of the CEO's strong performance and the Board's commitment to remunerating in line with policy and agreed that, in the context of the broader deferral of remuneration reviews and the uncertain external environment, it was appropriate to defer the review until FY2022.

The Board, in consultation with its external advisor, undertook a comprehensive assessment of the remuneration framework during FY2020, with a specific focus on ensuring that the LTI Plan (LTIP) structure is fit for purpose. There is increasing concern the LTIP is not adequately achieving its objectives of attracting executive talent, retaining key leaders, aligning with shareholders' interests and contributing to the generation of executive share ownership. The review concluded that the LTIP is not well suited to the commodity nature or investment profile of the energy industry, and that organisations facing similar business contexts in Australia and the UK have been adopting superior plans. Origin is particularly impacted by rapidly changing market and operating conditions because it has exposures to these issues in upstream and downstream businesses, unlike most organisations domestically or internationally. Furthermore, the review concluded that our current LTIP is failing to adequately achieve any of its objectives in terms of attracting, retaining or generating executive share ownership. During FY2020, the Board implemented special arrangements to secure and retain key talent, which would not have been necessary if the LTIP had been fit for purpose. To date, no Executive who had commenced with the Company in the last decade had received any shares through the LTIP mechanism, posing a fundamental challenge to the objective of building share ownership.

The Board considers that Long Term Share Plan (LTSP) models based around Restricted Shares with longer deferral periods are better suited to our business and has been evaluating the opportunities to move in this direction. I look forward to sharing our conclusions in due course.

Finally, there will be no changes to the structure or level of NED fees for FY2021.

Steven Sargent
Chairman, Remuneration and People Committee

Report structure

The report is divided into the following sections:

1. **Key Management Personnel**
2. **Remuneration link with Company performance and strategy**
3. **Remuneration framework details**
4. **Company performance and remuneration outcomes**
5. **Governance**
6. **Non-executive Director fees**
7. **Statutory tables and disclosures**

1. Key Management Personnel

The report discloses the remuneration arrangements and outcomes for people listed below: individuals who have been determined as Key Management Personnel (KMP) as defined by AASB 124 *Related Party Disclosures.* Members of the Remuneration and People Committee (RPC) are identified in the last column.

		Name	Role	Appointment	RPC
Non-executive	Board	G Cairns	Chairman, independent	23 October 2013	✓
Non-executive	Board	J Akehurst	Independent	29 April 2009	
Non-executive	Board	M Brenner	Independent	15 November 2013	
Non-executive	Board	T Engelhard	Independent	1 May 2017	✓
Non-executive	Board	G Lalicker	Independent	1 March 2019	
Non-executive	Board	B Morgan	Independent	16 November 2012	
Non-executive	Board	S Perkins*	Independent	1 September 2015	✓
Non-executive	Board	S Sargent*	Independent	29 May 2015	Chair
Executive	Board	F Calabria	Chief Executive Officer (CEO)	19 October 2016	
Executive		L Tremaine	Chief Financial Officer (CFO)	10 July 2017	
Executive		J Briskin	Executive General Manager (EGM), Retail	5 December 2016	
Executive		G Jarvis	EGM Energy Supply & Operations	5 December 2016	
Executive		M Schubert	EGM Integrated Gas	1 May 2017	

* *Scott Perkins was Chair of the RPC until 31 December 2019; Steven Sargent became RPC Chair from 1 January 2020. Steven is also Chair of the Origin Foundation.*

The term ‘Other Executive KMP’ (abbreviated as ‘Other’ in tables and charts) refers to Executive KMP excluding the CEO.

Executive team is a broader reference to the Executive Leadership Team.

2. Remuneration link with Company performance and strategy

2.1 Overview of remuneration framework

Our remuneration framework is designed to support the Company's strategy and to reward our people for its successful execution. It is designed around three principles, summarised in the diagram below.

Strategy

Connecting customers to the energy and technologies of the future

Leading customer experience and solutions; accelerating towards clean energy; embracing a decentralised and digital future; striving to be a low-cost operator; developing resources to meet growing gas demand; maintaining disciplined capital management.

Remuneration principles

Attract and retain the right people	Pay fairly	Drive focus and discretionary effort
The framework secures high-calibre individuals from diverse backgrounds and industries, with the talent to execute the strategy.	*The framework is market competitive. Outcomes are a function of Company performance, reflect our behavioural expectations and our values, and align with shareholder expectations.*	*The framework encourages Executives to think and act like owners and to deliver against long-term strategies and the short-term business priorities that are expected to drive long-term outcomes.*

Remuneration framework

Element	Performance measures	Link to principles and strategy
Fixed Remuneration (FR) Comprises cash salary, superannuation and benefits. *Details in Section 3.1*	Determined by the scope of the role and its responsibilities, benchmarked annually against similar roles.	Set at competitive levels to attract and retain the right people, and to pay fairly.
Variable Remuneration (VR) The majority of remuneration is variable and delivered in deferred equity to reward performance and to align Executive and shareholder interests. *Details in sections 3.2 and 3.6*		
Short Term Incentive (STI) Annual incentive opportunity, 40–50 per cent paid in cash, 50–60 per cent paid in shares restricted for two years. *Details in sections 3.3 and 3.5*	Performance targets set one year in advance across a balanced scorecard (generally 60–65 per cent financial metrics and 35–40 per cent non-financial metrics) with an overriding conduct/behaviour assessment.	Annual targets to drive execution of business plans: financial performance, operating efficiency, customer experience, safety, and measures supporting the attraction and retention of the right people.
Long Term Incentive (LTI) Granted as performance share rights allocated at face value. These vest at three years and are deferred for a total of four years. *Details in sections 3.4 and 3.5*	Performance targets set three years in advance, using an internal measure (Origin's return on capital employed) and an external measure (Origin's relative total shareholder return).	Designed to encourage long-term focus, and build and retain share ownership.

2.2 Behavioural assessment

Origin believes that observance of our values and behaviours and the quality of the relationships with our customers and the broader community are inextricably linked to the creation of shareholder value.

A formal behavioural assessment forms part of our performance management framework. It is based on the Behaviourally Anchored Rating Scale (BARS) methodology that assesses an individual's performance against specific examples of behaviour required for different roles and levels, rather than against generic descriptors. This adds qualitative and quantitative information into the appraisal process. The behavioural assessment can result in incentive outcomes being adjusted up or down, within the prescribed maximum amount.

2.3 Minimum shareholding requirement for Executive KMP

A key objective of the remuneration framework is to promote employee share ownership and to encourage employees to think and act as owners. Equity is therefore a key element of remuneration, representing at least half of STI awards and the whole of LTI awards. This is supplemented by other share plan arrangements, including salary sacrifice, share purchase and matching plans (see Section 3.7).

Executive KMP are required to build and maintain a minimum shareholding in the Company, defined as the equivalent of two times FR for the CEO, and as FR for Other Executive KMP. From time to time, the Board determines the minimum shareholding requirement (MSR) as a number of shares based on FR and share price.[1] The MSR is currently set at 620,000 shares for the CEO and 130,000 for Other Executive KMP.

Until the MSR is reached, disposals are prohibited except as reasonably required to meet Employee Share Scheme taxation liabilities. Once the MSR is reached, disposals are prohibited where they would take the holding below the MSR level, except in extraordinary circumstances approved by the Board. The governance mechanism is through trading restrictions over and above any other trading restrictions that apply.

Shares (restricted and unrestricted) and Deferred Share Rights (DSR) (without performance conditions) may be counted towards the MSR, but rights that are subject to performance conditions (including Performance Share Rights) may not be counted.

[1] Generally considering the weighted average share price over the prior year.

3. Remuneration framework details

3.1 Fixed Remuneration

FR comprises cash salary, employer contributions to superannuation and salary sacrifice benefits. It takes into account the size and complexity of the role, and the skills and experience required for success in the role.

FR is reviewed annually, but increases are not guaranteed. Roles are benchmarked to the median of corresponding roles in the reference market, currently made up of approximately 50 organisations listed on the Australian Securities Exchange (ASX).[2] In the absence of special factors, new or newly promoted incumbents generally commence below this reference point and move to the median over time. FR may be positioned above this reference point where it is appropriate for key talent retention purposes or where it is necessary to attract and secure key skills to fill a business-critical role. Accordingly, the median positioning may vary between approximately the 40th and 60th percentiles (P40 and P60) of the reference market.

3.2 Total Remuneration

Total Remuneration (TR) is the sum of FR and VR. The range of possible VR values is from nil for no award of STI or LTI to a maximum of the total of STI awarded at the maximum level plus the present-day values of the full face value of the LTI award, assuming that 100 per cent of the LTI award will vest.

Deferred equity elements (Deferred STI, and LTI) represent present-day values as it is not possible to predict future share prices, which can reduce or increase the ultimate value.

TR at target (TRT) includes an STI awarded at the target level (see Section 3.3) plus the present-day full face value of the LTI award, assuming that 50 per cent of the LTI will vest, being the 'risked expected value' of Origin's LTI awards (as detailed in Section 3.4).

TR minimum	**=**	**FR**	**+**	No STI awarded	**+**	No LTI awarded
TRT	**=**	**FR**	**+**	STI awarded at the target level	**+**	Full face value awarded; assumes that 50 per cent of the LTI will vest
TR maximum (TRM)	**=**	**FR**	**+**	STI awarded at the maximum level	**+**	Full face value awarded; assumes that 100 per cent of the LTI will vest

TRT is benchmarked to the median of equivalent TRT in the reference market, and the remuneration 'mix' (see Section 3.6) makes it possible for TRM (outcomes at their maximum) to achieve the top quartile in the TRT reference market.

[2] By way of a guideline, these 50 organisations are the largest by average market capitalisation over two years, after excluding the six largest, Macquarie Group, and those of foreign domicile, and always including AGL, Oil Search, Santos and Woodside.

3.3 FY2020 Short Term Incentive Plan details

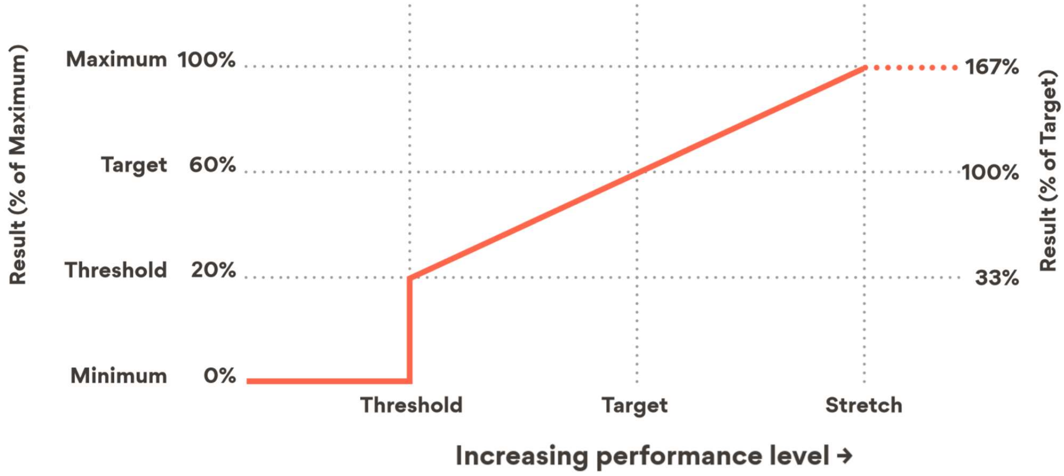
The following is a detailed description of how the STI Plan (STIP) operates.

<table>
<tr><th>Parameter</th><th>Details</th></tr>
<tr><td>Award basis</td><td>The annual performance cycle is 1 July to 30 June. Individual balanced scorecards are agreed, with shared Group objectives and targeted divisional objectives. Objectives are set across financial categories (generally 60 to 65 per cent of the weightings) and non-financial categories (generally 35 to 40 per cent). The CEO’s FY2020 scorecard details and outcomes are shown in Section 4.2.</td></tr>
<tr><td>Scorecard operation</td><td>Individual objectives on the scorecard are referenced to three performance levels: threshold, target and stretch (with pro-rating between each).

Threshold performance represents the lower limit of rewardable outcome for an individual objective – one that represents a satisfactory outcome, often achieving year-on-year improvement and contribution towards delivery of annual plans but short of the target level. Threshold performance corresponds to 20 per cent of maximum (33 per cent of target).

Target represents the expectation for achieving robust annual plans.

Stretch performance represents the delivery of exceptional outcomes well above expectations (the maximum, corresponding to 167 per cent of target).


</td></tr>
<tr><td>Opportunity level</td><td>The opportunity level for all Executive KMP was set to a standard for FY2020, with 100 per cent FR at target and a maximum of 167 per cent FR.

<table>
<tr><th colspan="3">FY20 STI opportunity (% of FR)</th></tr>
<tr><th>Minimum</th><th>Target</th><th>Maximum</th></tr>
<tr><td>0</td><td>100</td><td>167</td></tr>
</table></td></tr>
<tr><td>Award calculation</td><td>STIP award ($) = <strong>$ FR (at 30 June) × STIP opportunity (% of FR) × Balanced scorecard outcome (%)
↑
Discretionary modifier incorporating behavioural assessment</td></tr>
<tr><td>Assessment</td><td>Achievement and performance against each Executive’s balanced scorecard is assessed annually as part of the Company’s broader performance review process.

The review includes a behavioural assessment under the BARS methodology (see Section 2.2.). Directors consider this assessment together with a broader consideration of how outcomes have been achieved, including regulatory compliance, and financial and non-financial risk management. This may lead to a modification of the formulaic scorecard outcome, downward or upward, with the opportunity maximum operating as a cap.</td></tr>
</table>

Parameter	Details
Delivery and timing	40 to 50 per cent cash, paid in August to September following the end of the financial year. 50 to 60 per cent awarded in the form of Restricted Shares (RS) subject to a two-year holding lock, allocated as soon as practicable after Board approval, which is generally at the end of August following the end of the financial year. Prior to FY2018, Deferred STI was awarded in the form of DSRs.
RS allocation	Number of RSs = Deferred STI amount divided by the 30-day volume weighted average price (VWAP) to 30 June, rounded to the nearest whole number.
Service conditions	Unless the Board determines otherwise, the whole of the STI award is forfeited if the Executive resigns or is dismissed for cause during the performance year, and any RSs held from prior awards are also forfeited if in their restriction period.
Release	RSs in respect of FY2020 STI awards will be released on the second trading day following the release of full-year financial results for FY2022, subject to the service conditions being met and the service period completed (or else as described under 'Cessation of employment' below).
Dividends	As the STI has been earned and awarded, RSs carry dividend entitlements and voting rights.
Cessation of employment	No STI award is made where the service conditions have not been met in full, except where the Board decides otherwise. Typically such cases are limited to death, disability, redundancy or genuine retirement (good leaver circumstances). In such circumstances an STI award in respect of the current year may be wholly in cash, and restrictions on prior RSs may be lifted.
Sourcing of RSs	The Board's practice is to purchase shares on market but it may issue shares or make the award in alternative forms, including cash or deferred cash.
Governance and MSR	After restrictions on RSs are lifted, trading is subject to the MSR (see Section 2.3) and to the malus and clawback provisions in Section 5.5.

3.4 FY 2020 Long Term Incentive Plan details

The following is a detailed description of how the LTIP operates.

Parameter	Details
Award basis	LTIP awards are conditional grants of equity that may vest in the future, subject to the Company meeting or exceeding performance conditions, and subject also to the Executive meeting service and personal conduct and performance requirements. Awards are considered annually.
Opportunity and value range	The LTIP opportunity level reflects the capacity of the role to influence long-term sustainable growth and performance, and is set with reference to market benchmarks (see Section 3.2). It represents the face value of an equity award and is not discounted for hurdles or for dividends forgone. An award may be granted at a face value anywhere between zero and the maximum in the table below (the Award Face Value).

	Face value LTIP opportunity (% of FR)	
Executive KMP	Minimum	Maximum
CEO	0	180
Other	0	120

Parameter	Details
Opportunity and value range (continued)	The actual value of an LTIP award depends on the level of vesting and the share price at the time of vesting, neither of which can be determined in advance. The **minimum value** is zero assuming that none of the award vests, or none is awarded. The **maximum value** represents the present-day value assuming that 100 per cent of the award vests, ignoring the risks of achieving performance conditions and service requirements. The **target value** represents the risked or expected value, taking into account the likelihood of achieving the performance conditions. For market-based hurdles, such as Total Shareholder Return (TSR), this can be obtained actuarially. For non-market hurdles, it can be obtained from operational forecasts and estimation of the degree of difficulty in achieving the hurdles, or sometimes from historical results. Origin has determined its vesting expectation is approximately 50 per cent for both its relative TSR and Return on Capital Employed (ROCE) conditions.[3]
Behaviour assessment	The RPC may take the behaviour assessment referred to in Section 3.3 into account when recommending LTIP awards, or when considering the application of the governance provisions to awards made (see Section 5.5).
Delivery and timing	Performance Share Rights (PSRs): A PSR is a right to a fully paid ordinary share in the Company. PSRs are granted at no cost because they are awarded as remuneration. CEO: The LTIP award is submitted for approval at the Annual General Meeting (AGM) following the end of the financial year, and the equity grant is made as soon as practicable after shareholder approval. Other Executive KMP: LTIP grants are made as soon as practicable after Board approval, which is generally at the end of August following the end of the financial year.
PSR allocation	Number of PSRs = LTIP Award Face Value divided by the 30-day VWAP to 30 June, rounded to the nearest whole number.
Performance period and deferral length	The performance period is three financial years (FY2020–22) which, subject to vesting, is followed by a holding lock of one year. The lock on any vested shares will be lifted in August 2023, on the second trading day after the release of the FY2023 full-year results. The total deferral period from grant is approximately four years.
Service conditions	Unless the Board determines otherwise, unvested PSRs are forfeited if the Executive resigns or is dismissed for cause prior to the end of the relevant vesting period.

[3] Expected vesting is a function of the probabilities of achieving each of all possible outcomes. It is typically lower than, and should not be confused with, the probability of **any** vest occurring.

Parameter	Details
Performance conditions	There are two performance conditions, equally weighted.[4] One, Relative Total Shareholder Return (RTSR), is an external hurdle; the other, ROCE, is an internal hurdle.
External performance condition and vesting	RTSR measures the Company's TSR performance relative to a reference group of companies assuming reinvestment of dividends. It has been chosen because it aligns Executive reward with shareholder returns. It does not reward general market uplifts; vesting only occurs when Origin outperforms a market reference group. The reference group is based on a group of 50 ASX-listed companies[5] because this represents the most meaningful group with which Origin competes for shareholder investment and Executive talent. There is an insufficient number of operationally similar competitors to provide a useful 'selected' comparator group. Share prices are determined using three-month VWAPs on the start and end of the performance period. Vesting occurs only if Origin's TSR over the performance period ranks it higher than the 50th percentile (P50) of the reference group. Half of the PSRs vest on satisfying that condition, and all of the PSRs vest if Origin ranks at or above the 75th percentile (P75). Straight-line pro-rata vesting applies between these two points.
Internal performance condition and vesting	ROCE has been chosen because it is a profitability ratio that measures the efficiency of profit generation from capital employed. It predicts superior shareholder returns over the long term and reflects the importance of prudent capital allocation to generate sufficient returns. The ROCE tranche is divided into two equally weighted parts, each its own hurdle – Energy Markets (EM) and Integrated Gas (IG) – recognising the differing capital characteristics, risk profiles and growth profiles of each of these businesses. The average ROCE over three years must equal or exceed the average of three annual targets, which are reflective of delivering the weighted average cost of capital for each business. The starting point for the ROCE calculation is statutory earnings before interest and tax (EBIT) divided by average capital employed for the relevant business. Statutory EBIT is adjusted for fair value and foreign exchange movements in financial instruments, which are highly volatile and outside the control of management. Other adjustments to the ROCE calculation may be made in limited circumstances where the Board considers it appropriate to do so. For example, it may be appropriate to adjust EBIT when it is adversely impacted by short-term factors associated with value creating initiatives (for example, acquisitions). Vesting is independent for the EM and IG parts. In each case, half of the relevant PSRs will vest if the target is met, and all of the relevant PSRs will vest if the target is exceeded by two percentage points or more. Straight-line pro-rata vesting applies between these two points. Full vesting occurs only when both targets are exceeded by two percentage points or more.
Dividends	PSRs carry no dividend entitlements or voting rights. Vested shares (including RSs) carry dividend entitlements and voting rights.

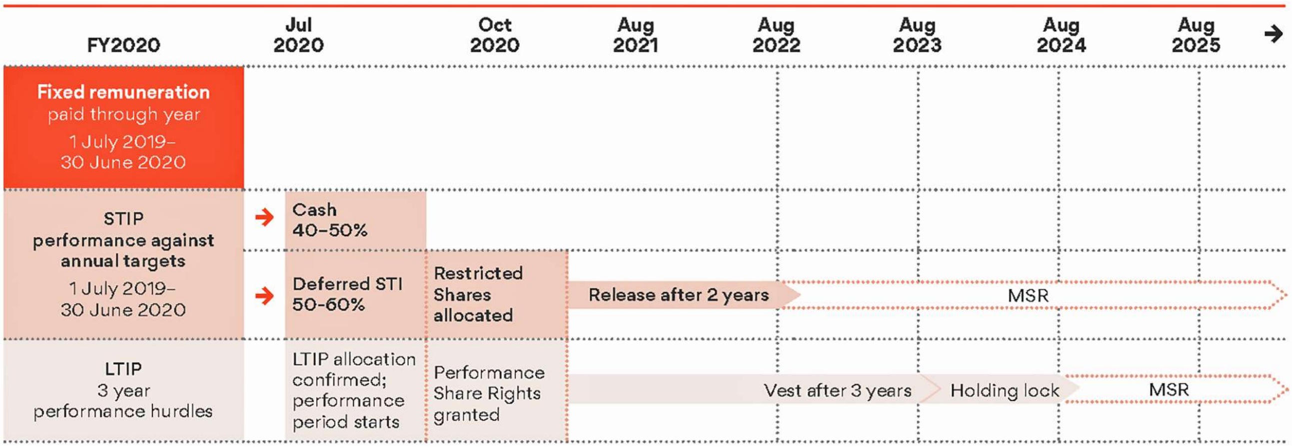
[4] Where the number of PSRs to be allocated is an uneven number, the number allocated to the ROCE tranche is rounded to the nearest even number, and the balance of PSRs is allocated to the RTSR tranche.

[5] The reference group is set at the commencement of the performance period. For FY2020, it comprised AGL, Amcor, AMP, Ampol (Caltex), ANZ, APA Group, Aristocrat Leisure, ASX Limited, Aurizon, BHP, Brambles, Cochlear, Coles, Commonwealth Bank of Australia, Computershare, CSL Limited, Dexus, Fortescue, Goodman Group, GPT Group, IAG, James Hardie, Lendlease, Macquarie, Medibank Private, Mirvac, National Australia Bank, Newcrest, Oil Search, Qantas, QBE, Ramsay Health Care, Rio Tinto, Santos, Scentre Group, Sonic Healthcare, South32, Stockland, Suncorp, Sydney Airport, Tabcorp, Telstra, Transurban, Treasury Wine Estates, Vicinity Centres, Wesfarmers, Westpac Banking Corporation, Woodside and Woolworths. Companies are not replaced (for example in consequence of merger, acquisition or delisting) unless the Board determines otherwise.

Parameter	Details
Cessation of employment	Unvested LTIP awards will lapse on the date of cessation, unless the Board determines otherwise. Typically such cases are limited to death, disability, redundancy or genuine retirement (good leaver circumstances). In such circumstances, LTIP awards may be held on foot subject to their original performance conditions and other terms and conditions being met (except for the waived service condition), or dealt with in an appropriate manner as determined by the Board. The restriction on vested shares may be lifted at the date of cessation in good leaver circumstances.
Sourcing	Upon vesting of a part or all of an LTIP award, the Board's preferred approach is to purchase shares on market, but it may issue shares or make the award in alternative forms, including cash or deferred cash.
Governance and MSR	After restrictions are lifted on RSs arising from LTIP vesting, trading is subject to the MSR (see Section 2.3) and to the malus and clawback provisions in Section 5.5.

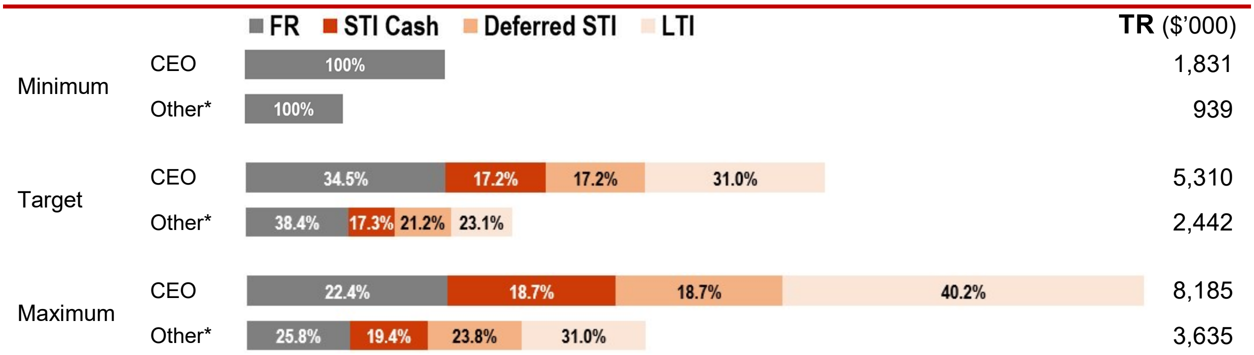
3.5 Remuneration cycle timelines

The following chart summarises the remuneration cycle and timelines.



3.6 Remuneration range and mix

The following chart shows the potential remuneration range and corresponding component mix for FY2020.



*The average of Other Executive KMP

Deferred equity (Deferred STI plus LTI) makes up a substantial part of TR. At target outcomes, it comprises almost half (CEO 48.2 per cent; Other Executive KMP 44.2 per cent) and at maximum outcomes it is more than half (CEO 58.9 per cent; Other Executive KMP 54.7 per cent).

3.7 Other equity/share plans

The Company operates a universal Employee Share Plan in which all full-time and part-time employees can choose to be eligible for awards of up to $1,000 worth of Company shares annually, or else participate in a salary sacrifice scheme to purchase up to $4,800 of shares annually.

Under the $1,000 scheme, shares are restricted for three years or until cessation of employment, whichever occurs first. Shares purchased under the sacrifice scheme are restricted for up to two years or until cessation of employment, whichever occurs first.

For every two shares purchased under the salary sacrifice scheme within a 12-month cycle, participants are granted one matching share right at no cost. The matching share rights vest two years after the cycle began, provided that the participant remains employed by the Company at this time. Each matching share right generally entitles the participant to one fully paid ordinary share in the Company, or in certain limited circumstances a cash equivalent payment. The matching share rights do not have any performance hurdles as they have been granted to encourage broad participation in the scheme across the Company, and to encourage employee share ownership. All shares are currently purchased on market.

Directors are not eligible to participate in the above schemes, but may participate in the NED Share Acquisition Plan by sacrificing Board fees. This plan is intended to facilitate share acquisition, enabling new Directors to meet their MSR obligations. All NEDs currently meet their MSR and no shares were acquired under the scheme in FY2020.

Directors regularly assess the risk of the Company losing high-performing key people who manage core activities or have skills that are being actively solicited in the market. Where appropriate, the Board may consider the selected use of deferred payment arrangements to reduce the risk of such critical loss. From time to time, it may be necessary to offer sign-on equity to offset or mirror unvested equity, which a prospective executive must forfeit to take up employment with Origin.

4. Company performance and remuneration outcomes

This section summarises remuneration outcomes for FY2020 and provides commentary on their alignment with Company outcomes.

4.1 Five-year Company performance and remuneration outcomes

The table below summarises key financial and non-financial performance for the Company from FY2016 to FY2020, grouped and compared with short-term and long-term remuneration outcomes.

Five-year key performance metrics FY2016–20[1]

	FY16	FY17	FY18	FY19	FY20
Operational measures					
Underlying earnings per share (EPS) (cents)	23.2	31.3	58.2	58.4	58.1
Underlying EPS (continuing activities)[2] (cents)	18.1	22.8	47.7	58.4	58.1
Net cash from/(used in) operating and investing activities (NCOIA) ($m)	1,215	1,378	2,645	1,914	1,813
Energy Markets Underlying EBITDA ($m)	1,330	1,492	1,811	1,574	1,459
Integrated Gas Underlying EBITDA (total operations) ($m)	386	1,104	1,521	1,892	1,741
Adjusted net debt ($m)[3]	9,131	8,111	6,496	5,417	5,158
sNPS[4]	(16)	(16)	(13)	(6)	2
TRIFR[5]	4.2	3.2	2.2	4.5	2.6
Female representation in senior roles[6] (%)	27	29	32	30	32
Origin Engagement Score[7]	53	58	61	61	75
STI award outcomes					
Percentage of maximum[8] (%)	**26.3**	**63.3**	**88.7**	**73.7**	**84.1**
Return measures					
Closing share price at end of June ($)	5.75	6.86	10.03	7.31	5.84
Weighted average share price[9] during the year ($)	5.67	6.39	8.55	7.64	6.80
Dividends[10] (cents per share)	10.0	0.0	0.0	25.0	25.0
Annual TSR (%)	(42.0)	19.3	46.2	(26.1)	(17.7)
Three-year TSR[11] (CAGR % p.a.)	(18.5)	(14.2)	(2.6)	12.0	(8.0)
Group Statutory EBIT ($m)	(411)	(1,958)	480	1,432	305
Group Statutory EBIT (continuing activities)[4] ($m)	47	(1,746)	473	1,432	305
LTI outcomes					
LTI vesting percentage in the year[12] (%)	**0**	**0**	**0**	**0**	**0**

1 Except as noted in (2) below, FY2018 and prior year financials shown are those as previously reported. They have not been restated for the presentation of certain electricity hedge premiums, which are included in underlying from FY2019, or for the reclassification of futures collateral balances to operating cash flows (previously in financing cash flows in prior periods). A restatement for these factors for FY2018 only was provided in the FY2019 Consolidated Financial Statements at note A1 Segments and in the Statement of cash flows, for indicative comparison purposes only.
2 Excludes Contact Energy (FY2016) and Lattice Energy (FY2016–18).
3 Adjusted Net Debt for FY2020 includes first recognition of lease liability ($514m) under AASB16
4 sNPS is measured at the business level and is an industry-recognised measure of customer advocacy.
5 TRIFR is the total number injuries resulting in lost time, restricted work duties or medical treatment per million hours worked.
6 Senior roles refers to those with Korn Ferry Hay grade classifications above a level that currently corresponds to a TRT (see Section 3.2) of approximately $180,000 p.a.
7 Employee engagement is measured as a score through an annual Company-wide survey conducted independently.
8 This is the total dollar value of STI awarded for Executive KMP as a percentage of their total maximum STI. The percentage of STI forfeited is this amount subtracted from 100 per cent.
9 For FY2016 the weighted average share price incorporates a restatement for the bonus element of the rights issue completed in October 2015. The opening share price on 1 July 2015 was $10.47.
10 Dividends represent the interim plus final dividends determined for each financial year. For FY2020 this includes the final dividend determined on 20 August 2020 to be paid on 2 October 2020. The amounts paid within each financial year are 35c, 0c, 0c, 10c and 30c, respectively.
11 TSR calculations use the three-month VWAP share price to 30 June, reflecting the testing methodology for relative TSR ranking.
12 No LTI rights vested during FY2020. Options and rights awarded in October 2015 were all forfeited.

The remuneration outcomes for FY2020 reflect financial performance approaching stretch levels, and are above target for non-financial performance.

The table shows that overall awarded STI outcomes for Executive KMP were 84.1 per cent of maximum for FY2020, and have varied between 26.3 per cent and 88.7 per cent of maximum over the last five years, underlining the variability of STI outcomes with Company performance.

No LTI vested during the year. All Options and all PSRs awarded in October 2015 were forfeited.

The specific performance metrics for the CEO scorecard, together with individual results for FY2020 STI, are provided in the table below.

The Board has adopted governing principles to apply when considering adjustments to financial measures that are used for remuneration purposes. Targets set at the beginning of the year may be subject to events materially outside the course of business and outside the control of the current management, in which case discretion may be required to vary targets or outcomes to reflect the intended purpose and/or actual results and achievements. The governing principles emphasise fairness and symmetry: fairness to shareholders and Executives, and symmetry of treatment between favourable and unfavourable events.

In addition to delivering very good operational and financial outcomes against targets set at the beginning of the year, executive team responded rapidly and performed extremely well to the series of emergency activities triggered in the second half by the bushfire and COVID-19 emergencies, as identified in the Letter from the Chairman at the beginning of this Report.

4.2 STI awards and scorecard details for FY2020

STI awards are calculated on the basis of a balanced scorecard using the concepts of setting requirements at threshold, target and stretch achievement levels. The CEO's FY2020 scorecard was weighted 65 per cent to financial measures and 35 per cent to non-financial metrics (customer, people and strategic). The details and results are set out below.

CEO FY2020 STI scorecard

Measure, rationale and performance	Weight	Targets and results: Threshold	Target	Stretch	Result	Outcome
Origin EPS (underlying) (cps) *Measure of Origin's earnings and profitability*	15%	49.5	52.7	58.9	58.1	158% tgt
Origin NCOIA ($m) *Measure of effective cash flow generation*	10%	1,055	1,157	1,342	1,813	167% tgt
Energy Markets EBITDA ($m) *Measure of operating performance of the Energy Markets business*	17.5%	1,401	1,426	1,501	1,459	129% tgt
APLNG production rate (PJ) *Ability to keep APLNG assets producing at their maximum capacity (*FY2021–22 average annual)*	5.6%	680	692	710	707.6	158% tgt
APLNG find and develop cost ($/GJ) *Measure of competitiveness*	5.6%	1.52	1.19	1.10	1.10	167% tgt
APLNG production unit cost ($/GJ) *Measure of competitiveness*	5.6%	2.05	1.93	1.85	1.87	150% tgt
Integrated Gas free cash flow ($m) *Measure of effective cash flow generation in Integrated Gas (excluding impact of oil price changes or foreign exchange)*	5.7%	989	1,070	1,157	1,086	112% tgt
Financial measures sub-total	**65%**	33	100	167	147.9	147.9% tgt **88.6% max**
Voice of the customer *Strategic, interaction and episodic NPS each achieved stretch targets at record levels*	10%	33	100	167	167	167% tgt
Customer innovation *Measures of readiness of new customer solutions, including control systems/Internet of Things, Retail 2020 transformation and Business Energy strategy execution*	5%	33	100	167	134	134% tgt
Safety and People measures *Employee engagement achieved stretch (record) level, group HSE (preventive and safety) targets were exceeded, and the percentage of women in senior roles met target*	20%	33	100	167	137.1	137% tgt
Non-financial measures sub-total	**35%**	33	100	167	145.3	145.1% tgt **86.9% max**
Total	**100%**	33	100	167	147.0	147.0% tgt **88.0% max**
Adjusted total[6]						139.5% tgt **83.5% max**

[6] On a final review of all results, management made modest downward adjustments to the final outcomes.

Underlying earnings per share exceeded our target due to a stronger than target result at Australia Pacific LNG (APLNG) driven by record production and favourable commodity prices, and a higher than target result from Energy Markets driven by strong performance in our gas business. Strong cash generation was driven by a record cash distribution of $1,275 million from APLNG, and proceeds from the sale of Ironbark of $231 million.

APLNG delivered record production, reflecting improved field performance with higher well availability and facility reliability. APLNG production costs were better than target due to improved field performance, resulting in lower gas purchases and lower costs associated with well workovers.

Our sNPS score increased to +2, the highest of any Tier 1 provider. We have simplified our product suite and continue to streamline and digitise the customer journey. Customers are increasingly choosing to engage with us through digital channels: 68 per cent of customers now use e-billing, and service call volumes reduced by a further 8 per cent this year. We are on track to achieve our target of reducing the cost to serve by $100 million from FY2018 to FY2021, and are growing our Solar, Community Energy Services (CES) and Broadband businesses. We expect our acquisition of a 20 per cent stake in the fast-growing UK retailer and technology company Octopus Energy will further streamline and improve the customer journey.

Our personal safety improved, with our TRIFR falling from 4.4 in FY2019 to 2.6 in FY2020. Our Actual Serious Incidents and Potential Serious Incidents measures, which cover all aspects of HSE performance, both improved from last year.

Remuneration awards were approved after consideration of a range of other non-formulaic inputs, including advice from the Risk and Audit committees, providing assurance that management behaviours have been consistent with the Code of Conduct and with the Company's principles, values and risk appetite (see Section 2.2).

The majority of the CEO's scorecard objectives are shared across Other Executive KMP. However, their weightings will differ according to their specific divisional metrics. This will lead to a degree of variability in outcomes across Executive KMP. For FY2020, the overall scorecard outcomes ranged between 82.3 per cent and 86.8 per cent of maximum, as summarised below.

	STI award		
Executive KMP	**% of maximum**	**% forfeited**	**$'000**
F Calabria	83.5	16.5	2,554
L Tremaine	83.7	16.3	1,421
J Briskin	82.3	17.7	1,237
G Jarvis	86.8	13.2	1,333
M Schubert	84.9	15.1	1,304

4.3 Total pay received in FY2020

In line with general market practice, a non-AASB presentation of actual pay received in FY2020 is provided below, as a summary of real or 'take home' pay. AASB statutory remuneration is presented in Table 7-1.

Executive KMP	FR received	STI cash[1]	DSRs vested[2]	LTI vested[3]	Actual pay received
F Calabria	1,831	1,277	478	0	**3,586**
L Tremaine	1,017	711	688	0	**2,416**
J Briskin	835	495	171	0	**1,501**
G Jarvis	867	666	191	0	**1,724**
M Schubert	867	522	139	0	**1,528**

1 STI cash represents 40 to 50 per cent of the FY2020 STI award, with the balance (50 to 60 per cent) deferred into equity.
2 DSRs vested were from Deferred STI grants awarded in 2016 and 2017. The value represents the number of shares vested multiplied by Origin's closing share price at the time of vesting.
3 LTI vested represents the value of LTI awards from prior years that vested wholly or partially during the year. Options and PSRs awarded in October 2015 were forfeited during the year with nil vesting.

5. Governance

5.1 Role of the Remuneration and People Committee

The RPC supports the Board by overseeing Origin's remuneration policies and practices. It operates under a Charter (published on the Company's website at originenergy.com.au). The RPC met formally five times during the reporting period.

Including its Chairman, the RPC has four members, all of whom are independent NEDs (see Section 1 for details). The RPC's Charter requires a minimum of three NEDs. In addition, there is a standing invitation to all Board members to attend the RPC's meetings. Management may attend RPC meetings by invitation but a member of management will not be present when their own remuneration is under discussion.

The following diagram sets out the role of the RPC and its operational relationships with the Board, management, stakeholders and external advisors.

Board

The Board approves

- Executive remuneration policy
- remuneration for the CEO and Executive Leadership Team (ELT)
- STI and LTI targets and hurdles
- NED fees
- CEO and ELT succession and appointments.

Remuneration and People Committee

The RPC makes recommendations to the Board on the matters subject to its approval (listed above). The RPC approves remuneration scales, movements and equity allocations for employees other than the CEO and ELT.

In addition, the RPC stewards and advises the Board and management on remuneration and people matters including:

- future leader talent pipelines and development processes
- people strategies and culture development
- corporate governance and risk matters relating to people and remuneration (including conduct, diversity and gender pay equity)
- effectiveness of the remuneration policy and its implementation.

Information exchange with other Board committees, notably the Audit and Risk committees, to ensure that all relevant matters are considered before the RPC makes remuneration recommendations and decisions.

Consultation with external stakeholders and shareholders

Regular dialogue with shareholders and proxy advisors.

Independent remuneration advisors

The RPC appoints an external independent advisor to assist it with market and governance issues, benchmarking, best practice observations and general advice.

Management

Management provides relevant data and information for RPC consideration (practice insights, and legal, tax, accounting and actuarial advice) and makes recommendations to the RPC concerning remuneration and people matters.

5.2 Remuneration advisors

The RPC engages external advisors from time to time to conduct benchmarking, advise on regulatory and market developments, and review proposals and reports. Protocols have been established for engaging and dealing with external advisors, including those defined as remuneration consultants for the purposes of the *Corporations Act 2001* (Cth) (the Act). These protocols are to ensure independence and avoid conflicts of interest.

The protocols require that remuneration advisors are directly engaged by the RPC and act on instruction from its Chairman. Reports must be delivered directly to the RPC Chairman. The advisor is prohibited from communicating with Company management except as authorised by the Chairman, and even then limited to the provision or validation of factual and policy data. The advisor must furnish a statement confirming the absence of any undue influence from management.

The RPC generally seeks information rather than specific remuneration recommendations within the definition of the Act, and this was the case during FY2020. Guerdon Associates was appointed its advisor during FY2020, however Guerdon Associates did not provide any remuneration recommendations as defined under the Act.

In addition, the RPC makes use of general market trend information from a variety of commercial and industry sources and has access to in-house remuneration professionals who provide it with guidance and analysis on request.

The recommendations that the RPC makes to the Board are based on its own independent assessment of the advice and information received from these multiple sources, using its experience and having careful regard to the principles and objectives of the remuneration framework, Company performance, shareholder and community expectations, and good governance.

5.3 Conduct, accountability and risk management

As identified in Section 2.2, a BARS methodology for behaviour and conduct assessment is an integral part of the Company's performance management framework and modification of formulaic incentive calculations.

In addition to the BARS tool, the full Board consults with the Chairman of the Audit Committee and the Chief Risk Officer when it formally reviews ELT performance and conduct each year.

In addition to considerations of personal behaviour and conduct, the RPC is guided by a set of overarching principles to apply in assessing items or events that impact risk (including non-financial risk) or performance (both positive and negative). This ensures a consistent approach to determining whether discretionary adjustments to incentive outcomes are warranted, to achieve fairness to Executives and shareholders. The RPC and the Board have wide discretionary tools to prevent the award (or retention) of inappropriate benefits, including malus and clawback.

Malus

Malus refers to the reduction or cancellation of advised awards, or of unvested/unreleased equity or shares; or to a determination to reduce the level of vesting that would otherwise apply, or to extend the existing period of a holding lock or trading restriction.

The Board has, from time to time, applied malus. For example, it awarded zero STI and LTI allocations for some Executives in FY2015 and FY2016 to ensure that outcomes were aligned with the overall circumstances of the Company, even though some of the relevant performance conditions had been met and preliminary award advice had been given.

Clawback

Clawback is a reference to the recovery of benefits after they have been paid, vested or released. The Board has power to exercise clawback to recover or cancel shares arising from equity awards, and to recover cash proceeds from the sale of such shares, or to recover cash awards. Recovery may be limited by law or regulation. There have been no circumstances to date in which the Board has sought to apply clawback.

Fraud, dishonesty, gross misconduct, negligence, breach of duties and other serious matters will have consequences additional to the sanctions and provisions referred to above.

5.4 Change of control

The Board may determine that all or a specified number of unvested securities will vest or cease to be subject to restrictions where there is a change of control event.

5.5 Capital reorganisation

On a capital reorganisation, the number of unvested share rights and Options held by participants may be adjusted in a manner determined by the Board, to minimise or eliminate any material advantage or disadvantage to the participant. If new awards are granted, they will, unless the Board determines otherwise, be subject to the same terms and conditions as the original awards.

6. Non-executive Director fees

6.1 Remuneration policy and structure for Non-executive Directors

NED remuneration comprises fixed fees with no incentive-based payments. This ensures that NEDs are able to independently and objectively assess both Executive and Company performance.

Board and committee fees take into account market rates for similar positions at relevant Australian organisations (those of comparable size and complexity) and fairly reflect the time commitments and responsibilities involved. The aggregate cap for overall NED remuneration remains at $3,200,000 p.a., as approved by shareholders on 18 October 2017.

The Origin Chairman receives a single fee that includes committee activities, while other NEDs receive a NED Base Fee and separate fees for their role on specific committees (other than the Nomination Committee, which is considered within the NED Base Fee). All fees include superannuation contributions.

The table below summarises the structure and level of NED fees. No change to the fee structure or quantum is proposed for FY2021.

NED and committee fees ($’000)

Office	FY2020 and FY2021
Board – Chairman (inclusive of committee fees)	677
NED Base Fee (exclusive of committee fees)	196
Audit – Chairman	57
Audit – Member	29
RPC – Chairman	47
RPC – Member	23.5
HSE – Chairman	47
HSE – Member	23.5
Risk – Chairman	47
Risk – Member	23.5
Nomination – Chairman	nil
Nomination – Member	nil
Origin Foundation – Chairman	nil

6.2 Minimum shareholding requirement for Non-executive Directors

To align the interests of the Board and shareholders, NEDs are required to build and then maintain a minimum shareholding in the Company. The MSR reference for the Chairman is 200 per cent of the NED Base Fee, and for all other NEDs it is 100 per cent of the NED Base Fee. The Board sets the MSR from time to time as a number determined by reference to the NED Base Fee and share price[7] (currently set at 28,000 shares, and 56,000 for the Chairman).

NEDs are expected to reach the MSR within three years of their appointment and maintain it thereafter while in office. At the date of this report, all NEDs were above the relevant MSR level. Details of NED shareholdings are included in Table 7-3.

A NED Share Plan (NEDSP) was approved by shareholders at the 2018 AGM. The NEDSP is a salary sacrifice plan that allows NEDs to sacrifice up to 50 per cent of their annual NED Base Fee to acquire share rights. Each share right is a right to receive a fully-paid ordinary share in Origin, subject to the terms of the grant. The plan is intended to facilitate the acquisition of shares for new Directors to ensure they meet the obligations imposed under the MSR. As at the date of the report, and noting that all NEDs have met their MSR obligations, no share rights have been purchased and no shares allotted under the NEDSP.

[7] Generally considering the weighted average share price over the prior year

7. Statutory tables and disclosures

Table 7-1 Executive KMP and NED statutory remuneration ($'000)

		Short term				Long term					Totals		
		PEB[1]					Share based						
		FR[1]						Deferred STI[4]		LTI[5]			
		Base salary	Super annuation	Non-monetary benefits[3]	Cash STI[2]	Leave accrual[6]	Matching share rights	RS	DSR		Total accounting remuneration	At risk (%)	Share-based (%)
Executive Director													
F Calabria	2020	1,768	21	41	1,277	(65)	—	1,053	180	812	5,087	65	40
	2019	1,710	21	39	1,025	68	—	601	303	812	4,579	60	37
Other													
J Briskin	2020	806	21	15	495	25	0.6	438	9	171	1,980	56	31
	2019	715	21	16	334	28	—	194	59	143	1,510	48	26
G Jarvis	2020	820	21	34	666	72	1.7	481	10	199	2,305	59	30
	2019	730	22	32	394	72	0.6	218	68	191	1,727	51	28
M Schubert[8]	2020	843	21	178	522	44	—	465	7	193	2,273	52	29
	2019	752	21	12	374	19	—	208	58	179	1,623	51	27
L Tremaine	2020	991	21	26	711	61	1.7	649	209	242	2,912	62	38
	2019	934	21	42	681	41	0.6	407	624	245	2,996	65	43
Executive total	**2020**	**5,228**	**105**	**294**	**3,671**	**137**	**4**	**3,086**	**415**	**1,617**	**14,557**	**60**	**35**
	2019	**4,841**	**106**	**141**	**2,808**	**228**	**1.2**	**1,628**	**1,112**	**1,570**	**12,435**	**57**	**35**
NEDs													
J Akehurst	2020	245	21	0.2	—	—	—	—	—	—	266	—	—
	2019	233	21	0.2	—	—	—	—	—	—	254	—	—
M Brenner	2020	251	21	0.2	—	—	—	—	—	—	272	—	—
	2019	241	21	0.2	—	—	—	—	—	—	262	—	—
G Cairns	2020	666	11	18	—	—	—	—	—	—	695	—	—
	2019	642	21	16	—	—	—	—	—	—	679	—	—
T Engelhard	2020	239	21	16	—	—	—	—	—	—	276	—	—
	2019	220	21	0.2	—	—	—	—	—	—	241	—	—
G Lalicker[7]	2020	175	21	0.2	—	—	—	—	—	—	196	—	—
	2019	54	7	0.1	—	—	—	—	—	—	61	—	—
B Morgan	2020	279	21	0.2	—	—	—	—	—	—	300	—	—
	2019	268	21	0.2	—	—	—	—	—	—	289	—	—
S Perkins	2020	274	21	18	—	—	—	—	—	—	313	—	—
	2019	266	21	0.2	—	—	—	—	—	—	287	—	—
S Sargent	2020	244	21	0.2	—	—	—	—	—	—	265	—	—
	2019	212	21	0.2	—	—	—	—	—	—	233	—	—
NED total	**2020**	**2,373**	**158**	**53**	—	—	—	—	—	—	**2,583**	—	—
	2019	**2,136**	**154**	**17**	—	—	—	—	—	—	**2,306**	—	—

1 FR comprises base remuneration and superannuation (post-employment benefit).
2 STI cash represents one half of the STI award. STI cash is paid after the end of the financial year to which it relates but is allocated to the earning year. The balance of the STI award is Deferred STI.
3 Non-monetary benefits include insurance premiums and fringe benefits such as car parking and expenses associated with travel.
4 Deferred STI is that portion of the accounting value of equity granted or to be granted (RSs and/or DSRs) under the STI plan for the current and prior periods attributable to the reporting period. In following reporting periods, the accumulated expense is adjusted for the number of instruments then expected to be released or vested. In good leaver circumstances, a bring-forward of future-period accounting expense may occur where a cessation of employment occurs before the normal vesting date.
5 LTI includes all long-term incentives (those not awarded under the STI Plan) and represents that portion of the accounting value of the awards made, or to be made, for the current and prior periods, which is attributable to the reporting period. See Note G3 for details on share-based remuneration accounting.
6 Movement in leave provision over the reporting period. Negative movement indicates that leave taken during the year exceeded leave accrued during the current year. FY2019 leave movements have been restated to include annual leave accruals for the relevant reporting period.
7 For FY2019, the pro-rata period for G Laliker was 1 March 2019 to 30 June 2019.
8 A review of prior-year fringe benefits tax returns is being undertaken as at the date of preparation of this Report, which may conclude that the accommodation benefits associated with travel between the Melbourne home base at the time and the Brisbane office in prior years were higher than previously reported and possibly comparable with the value shown here for FY2020.

Abbreviations in tables 7-2 through 7-4

DSR – Deferred Share Rights
PSR – Performance Share Rights (with performance conditions)
PSR (TSR) – Performance Share Rights, relative TSR performance condition
PSR (ROCE) – Performance Share Rights, ROCE performance condition
RS – Restricted Shares (including those held in trust under the Deferred STI arrangements)
MR – Matching Share Rights under the Employee Share Purchase and Matching Rights Plan (see Section 3.7)

Table 7-2 Details of equity grants made during the reporting period

Equity rights and restricted shares granted to Executive KMP during the reporting period are listed below. There is nil cost to recipients.

	Type	Number granted	Grant date fair value ($)[1]	Exercise price ($)	Grant date	Vest date[2]	Expiry date[3]
Executive Director							
F Calabria	PSR (TSR)	226,371	4.49	—	16-Oct-19	22-Aug-22	22-Aug-22
	PSR (ROCE)	226,371	7.25	—	16-Oct-19	22-Aug-22	22-Aug-22
	RS	143,242	8.12	—	16-Oct-19	23-Aug-21	—
Other							
J Briskin	PSR (TSR)	62,881	3.82	—	30-Aug-19	22-Aug-22	22-Aug-22
	PSR (ROCE)	62,881	6.77	—	30-Aug-19	22-Aug-22	22-Aug-22
	RS	46,689	7.63		30-Aug-19	23-Aug-21	—
	MR	190	0.47	—	27-Sep-19	23-Aug-21	—
G Jarvis	PSR (TSR)	67,073	3.82	—	30-Aug-19	22-Aug-22	22-Aug-22
	PSRs (ROCE)	67,073	6.77	—	30-Aug-19	22-Aug-22	22-Aug-22
	RS	55,000	7.63	—	30-Aug-19	23-Aug-21	—
	RS[4]	109,370	5.53	—	8-May-20	2021–2025	2021–2025
	MR	346	0.47	—	27-Sep-19	31-Oct-21	—
M Schubert	PSR (TSR)	67,073	3.82	—	30-Aug-19	22-Aug-22	22-Aug-22
	PSR (ROCE)	67,073	6.77	—	30-Aug-19	22-Aug-22	22-Aug-22
	RS	52,275	7.63	—	30-Aug-19	23-Aug-21	—
L Tremaine	PSR (TSR)	83,841	3.82	—	30-Aug-19	22-Aug-22	22-Aug-22
	PSR (ROCE)	83,841	6.77	—	30-Aug-19	22-Aug-22	22-Aug-22
	RS	95,090	7.63	—	30-Aug-19	23-Aug-21	—
	MR	346	0.47	—	27-Sep-19	31-Oct-21	—

1 For MRs, the fair value is per $1 contributed by the Executive.
2 For PSRs, the expiry date is the same as the vesting date. On vesting, PSRs convert to shares with a holding lock of a further one-year period. For RSs, the vest date refers to the date when the trading restriction is lifted.
3 Rights may expire earlier. To the extent that they fail to meet the relevant performance conditions, they will lapse on the vesting date.
4 RSs subject to tenure conditions (see Section 3.7) vesting in five equal (by number) tranches on 30 April in each of the five years from 2021 to 2025.

Table 7-3 Details of, and movements in, equity rights and ordinary shares of the Company

The following table summarises holdings and movements of rights and ordinary shares held (directly, indirectly or beneficially, including by related parties) over the reporting period (or KMP portion of the period), including grants, transactions and forfeits, by value and by number. See Table 7-4 for further details of the terms and conditions of those rights.

	Type	Held at start[1]	Granted[2]/acquired[3]		No. vested	Exercised		Forfeited[5]/ disposed[6]	Held at end[1,7]
			Number	Value ($)		Number	Value[4] ($)	Number	
Executive Director									
F Calabria	Options	1,203,145	—	—	0	0	0	570,150	632,995
	PSR	563,869	452,742	2,657,596	0	0	0	57,739	958,872
	DSR	176,002	—	—	65,223	65,223	478,085	0	110,779
	RS	106,684	143,242	1,163,125	0	0	0	0	249,926
	Shares	232,117	65,223	—	—	—	—	110,000	187,340
Other									
J Briskin	Options	86,910	—	—	0	0	0	0	86,910
	PSR	142,214	125,762	665,910	0	0	0	17,090	250,886
	DSR	23,340	—	—	23,340	23,340	171,082	0	0
	RS	33,435	46,689	356,237	0	0	0	0	80,124
	MR	0	190	1,743	0	0	—	0	190
	Shares	40,722	23,852	—	—	—	—	0	64,574
G Jarvis	Options	250,427	—	—	0	0	0	85,500	164,927
	PSR	142,678	134,146	710,303	0	0	0	25,976	250,848
	DSR	25,993	—	—	25,993	25,993	190,529	0	0
	RS	35,375	164,370	1,024,466	0	0	0	0	199,745
	MR	163	346	2,310	0	0	0	0	509
	Shares	36,061	29,623	—	—	—	—	—	65,684
M Schubert	Options	237,410	—	—	0	0	0	83,250	154,160
	PSR	138,626	134,146	710,303	—	—	—	25,292	247,480
	DSR	18,945	—	—	18,945	18,945	138,867	0	0
	RS	33,717	52,275	398,858	0	0	0	0	85,992
	Shares	55,973	19,077	—	—	—	—	23,636	51,414
L Tremaine	Options	81,441	—	—	0	0	0	0	81,441
	PSR	146,864	167,682	887,876	0	0	0	0	314,546
	DSR	170,015	—	—	93,813	93,813	687,649	0	76,202
	RS	72,500	95,090	725,537	0	0	0	0	167,590
	MR	163	346	2,310	0	0	0	0	509
	Shares	166,309	94,505	—	—	—	—	50,000	210,814
NEDs[8]									
J Akehurst	Shares	71,200	0	—	—	—	—	0	71,200
M Brenner	Shares	28,367	0	—	—	—	—	0	28,367
G Cairns	Shares	163,660	0	—	—	—	—	0	163,660
T Engelhard	Shares	34,421	0	—	—	—	—	0	34,421
G Lalicker	Shares	100,000	0	—	—	—	—	0	100,000
B Morgan	Shares	47,143	0	—	—	—	—	0	47,143
S Perkins	Shares	30,000	0	—	—	—	—	0	30,000
S Sargent	Shares	31,429	0	—	—	—	—	0	31,429

1 The number of instruments that held at the start/end of the reporting period.
2 Rights to equity and restricted shares in the Company granted to Executive KMP during the reporting period under the Equity Incentive Plan, as listed in Table 7-2. These were provided at no cost to the recipients.
3 Purchases and transfers in. For Other Executive KMP this includes allotments of fully paid ordinary shares granted or acquired under the Employee Share Plan, and shares received upon the vesting and exercise of DSRs. Executive Directors do not participate in the General Employee Share Plan (GESP) or the MSP.
4 After vesting and after payment of any exercise price (the exercise price for DSRs is nil). The value of rights exercised is calculated as the closing market price of the Company's shares on the ASX on the date of exercise, after deducting any exercise price. The exercise price for PSRs and DSRs is nil. DSRs vesting in the period were granted on 30 August 2016 (vested 26 August 2019), 30 August 2017 (vested 10 July 2019) and 18 October 2017 (vested 26 August 2019).
5 Forfeited Options and PSRs were granted in October 2015.
6 Sales and transfers out.
7 Rights are automatically exercised on vesting. There were no vested Options as at the end of the period. Other than rights and RSs disclosed elsewhere in this Report, no other equity instruments, including shares in the Company, were granted to KMP during the period.
8 NEDs are not issued shares under any incentive or equity plans. Acquisitions include purchases of shares on market, or pursuant to the Company's dividend reinvestment plan or the August 2015 Entitlement Offer.

Table 7-4 Summary of share rights granted

The table below lists all the share rights outstanding at 30 June 2020 that have been granted to current or former employees (including Executive Directors and Executive KMP) under equity-based incentive plans. Equity-based incentives are not granted to NEDs. No terms of equity-settled share-based transactions have been altered or modified subsequent to grant. Share rights that failed to meet their performance hurdles on vesting dates prior to 30 June 2020 have all lapsed.

Granted	Number outstanding	Number outstanding held by KMP	Exercise price	Earliest vest date[1]	Last possible expiry date[2]
Legacy Options					
30 August 2016	1,421,289	373,806	$5.67	23 August 2021	28 August 2026
19 October 2016	450,000	—	$5.21	23 August 2021	28 August 2026
30 August 2017	81,441	81,441	$7.37	23 August 2021	28 August 2026
30 August 2017	905,363	263,898	$7.37	22 August 2022	23 August 2027
18 October 2017	401,288	401,288	$7.37	22 August 2022	23 August 2027
PSRs					
30 August 2016	1,166,540	143,777	—	24 August 2020	24 August 2020
19 October 2016	129,558	—	—	24 August 2020	24 August 2020
30 August 2017	841,583	24,415	—	24 August 2020	24 August 2020
30 August 2017	24,415	83,432	—	23 August 2021	23 August 2021
18 October 2017	126,866	126,866	—	23 August 2021	23 August 2021
10 September 2018	1,355,077	317,419	—	23 August 2021	23 August 2021
17 October 2018	312,245	312,245	—	23 August 2021	23 August 2021
30 August 2019	1,848,417	561,736	—	22 August 2022	22 August 2022
16 October 2019	452,742	452,742	—	22 August 2022	22 August 2022
DSRs					
30 August 2016	19,667	19,667	—	24 August 2020	24 August 2020
30 August 2017	76,202	76,202	—	10 July 2020	10 July 2020
30 August 2017	26,057	—	—	24 August 2020	24 August 2020
18 October 2017	45,556	45,556	—	24 August 2020	24 August 2020
18 October 2017	45,556	45,556	—	23 August 2021	23 August 2021
MRs					
26 September 2018	130,065	312	—	31 October 2020	31 October 2020
27 September 2019	98,476	570	—	31 October 2021	31 October 2021

1 The vest date for PSRs granted since 2018 does not include the trading restriction of approximately one year that applies to the shares allocated on vesting.

2 The expiry date is the same as the vesting date where the terms of the grant apply automatic exercise on vesting. Where there is no automatic exercise on vesting, the expiry date is the last possible expiry. Rights and Options may expire earlier; for example, to the extent that they do not meet their performance conditions, they will lapse on the vesting date.

Table 7-5 Executive service agreements

The main terms of executive service agreements at 30 June 2020 are set out in the table below.

Item	CEO	Other Executive KMP
Basis of contract	Ongoing	Ongoing
Notice period	• 12 months by either party • Shorter notice may apply by agreement • No notice in defined circumstances[1]	• Six months (three months for J Briskin) by either party • Shorter notice may apply by agreement • No notice in defined circumstances[1]
Termination benefits for cause	Statutory entitlements only	Statutory entitlements only
Termination benefits for resignation	Notice as above or payment in lieu of notice that is not worked; current-year STI forfeited; unvested equity lapses; statutory entitlements	Notice as above or payment in lieu of notice that is not worked; current-year STI forfeited; unvested equity lapses; statutory entitlements
Termination benefits for other than resignation or cause	Notice worked (or payment in lieu of any portion not worked); pro-rata STI for the period worked (no deferral applicable); all unvested equity lapses unless held on foot in accordance with Equity Incentive Plan Rules[2]; statutory entitlements.	Notice worked (or payment in lieu of any portion not worked); pro-rata STI for the period worked (no deferral applicable); all unvested equity lapses unless held on foot in accordance with Equity Incentive Plan Rules[2]; statutory entitlements. For redundancy, payment in accordance with the Company's general redundancy policy of three weeks FR per year of service, with a minimum of 18 weeks and a maximum of 78 weeks.
Remuneration	Remuneration is reviewed annually or as required to maintain alignment with policy and benchmarks.	Remuneration is reviewed annually or as required to maintain alignment with policy and benchmarks.

1 These circumstances include but are not limited to serious or persistent or wilful misconduct, breach of contract, or conduct likely to seriously injure the reputation of the Company.

2 For example, in cases of death, disability, genuine retirement or extraordinary circumstances, as approved by the Board.

7-6 Loans to KMP

No loans have been made, guaranteed or secured, directly or indirectly, by the Company or any of its subsidiaries, at any time throughout the year, to any KMP including to a KMP related party.

Signed in accordance with a resolution of Directors.

Gordon Cairns, Chairman
Sydney, 20 August 2020