

# Vicinity Centres - Climate Change 2018

## C0. Introduction

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### C0.1

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#### **(C0.1) Give a general description and introduction to your organization.**

Vicinity Centres (Vicinity) is one of Australia's leading retail property groups with a fully integrated asset management platform. Our strategy is to deliver strong and sustainable growth, through focusing our directly-owned portfolio on market-leading destinations, expanding our wholesale funds platform and realising mixed-use opportunities across the portfolio. We do this by delivering the best retail mix and engaging experiences to attract consumers and support our retail partners; enhancing our portfolio quality through select retail and mixed-use developments, divestments and acquisitions; and intensively managing our centres to drive income growth and operational efficiencies. Through this strategy, Vicinity aims to create long-term value from our portfolio of Australian retail assets, creating places where people love to connect and true to our purpose, enriching the communities in which we operate.

A top 50 entity on the Australian Securities Exchange (ASX) (as at 30 June 2018), Vicinity is one of the largest listed managers of Australian retail assets. At 30 June 2018, Vicinity had 82 retail assets under management (74 assets in direct portfolio), valued at over \$27.7 billion and generating annual retail sales of \$18.2 billion across over 2.8 million square metres of gross lettable area.

Vicinity's portfolio includes interests in some of Australia's well-known shopping centres including Emporium Melbourne and Chadstone Shopping Centre in Victoria, Chatswood Chase in Sydney, New South Wales, Queens Plaza and The Myer Centre Brisbane in Queensland and Galleria and Mandurah Forum in Western Australia, as well as the DFO outlets.

Vicinity operates its business cognizant of its role and impact on the environment, society and its stakeholders. Vicinity's Sustainability Strategy, approved by the Board of Directors in May 2016, governs our approach to environment, social and governance (ESG) matters including climate change adaptation and mitigation, operational efficiency, supply chain and tenant relationships. The Strategy is detailed on our website at <http://sustainability.vicinity.com.au/our-business-and-strategy>.

Details of Vicinity's Code of Conduct Policy, and its Corporate Governance Statement can be found on our website at <http://www.vicinity.com.au/aboutus/corporategovernance>.

This is the thirteenth submission made by Vicinity (and its historical organisations) to the CDP. Prior to 2015, submissions were made by the Novion Property Group (covering the period 1 January 2014 to 31 December 2014) and by CFS Retail Property Trust (prior to 2014).

Vicinity and its predecessor entities have been included in the Dow Jones Sustainability Index (DJSI) suite of leadership indices from 2004 to 2014 and 2016 to 2017, and in the FTSE4Good Index since 2001. In 2017, Vicinity's direct portfolio was also recognised as the Regional Sector Leader Retail in Australia and New Zealand, and 4th place globally, by the Global Real Estate Sustainability Benchmark (GRESB).

### C0.2

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**(C0.2) State the start and end date of the year for which you are reporting data.**

	Start date	End date	Indicate if you are providing emissions data for past reporting years	Select the number of past reporting years you will be providing emissions data for
Row 1	January 1 2017	December 31 2017	No	<Not Applicable>
Row 2	<Not Applicable>	<Not Applicable>	<Not Applicable>	<Not Applicable>
Row 3	<Not Applicable>	<Not Applicable>	<Not Applicable>	<Not Applicable>
Row 4	<Not Applicable>	<Not Applicable>	<Not Applicable>	<Not Applicable>

**C0.3**

**(C0.3) Select the countries/regions for which you will be supplying data.**

Australia

**C0.4**

**(C0.4) Select the currency used for all financial information disclosed throughout your response.**

AUD

**C0.5**

**(C0.5) Select the option that describes the reporting boundary for which climate-related impacts on your business are being reported. Note that this option should align with your consolidation approach to your Scope 1 and Scope 2 greenhouse gas inventory.**

Operational control

**C1. Governance**

**C1.1**

**(C1.1) Is there board-level oversight of climate-related issues within your organization?**

Yes

**C1.1a**

**(C1.1a) Identify the position(s) of the individual(s) on the board with responsibility for climate-related issues.**

Position of individual(s)	Please explain
Board/Executive board	Vicinity's Sustainability strategy (which addresses climate change adaptation and mitigation) and Climate Policy were approved by the Board of Directors. The Board has ultimate responsibility for delivery of Vicinity's Sustainability strategy, and is updated on the implementation of the Sustainability strategy every quarter. The Board is responsible for making decisions related to major sustainability programs (such as the approval of Vicinity's Integrated Energy Strategy and long-term carbon reduction targets) and also receives reports on outcomes and recommendations of major programs such as our climate change program (covering both adaptation and mitigation).

Position of individual(s)	Please explain
Other, please specify (Board Risk and Compliance Committee)	The Risk and Compliance Committee of the Board is comprised of four members, all of whom are Non-Executive Directors. The Committee oversees and reviews Vicinity's risk management and safety frameworks, and monitors Vicinity's work health and safety and environment and sustainability practices. This includes bi-annual review of Vicinity's enterprise risks, which identify climate change as a material business risk. The Committee has received deep dive reporting on Vicinity's climate risk approach, including outcomes of assessments completed to date, as well as reporting on progress of implementation of Vicinity's sustainability policies (which includes our Climate Policy and Environment Policy) and against public sustainability objectives (which includes those relating to climate resilience and creating a low carbon portfolio).
Chief Executive Officer (CEO)	Vicinity Centres' CEO and Managing Director is a member of the Board. The CEO also chairs the Sustainability Committee – a management level committee comprised of the Chief Executive Officer, Chief Investment Officer, Executive General Managers of Development and Shopping Centres, and other senior leaders. The Sustainability Committee oversees the Sustainability strategy and initiatives implemented across the business, which includes the program of work under Climate Resilience and Low Carbon Smart Assets pillars, and monitors Vicinity's performance against targets.

## C1.1b

### (C1.1b) Provide further details on the board's oversight of climate-related issues.

Frequency with which climate-related issues are a scheduled agenda item	Governance mechanisms into which climate-related issues are integrated	Please explain
Scheduled – some meetings	Reviewing and guiding strategy Monitoring implementation and performance of objectives	Vicinity's Board of Directors reviews and approves the Sustainability strategy, sustainability policies and commitments, and has the ultimate responsibility for sustainability at Vicinity. A scheduled update on the implementation of the Sustainability strategy and its three key pillars (Low Carbon Smart Assets, Climate Resilience and Community Significance) is given to the Board by the Chief Investment Officer (CIO) (under which the Sustainability function sits) every quarter.
Sporadic - as important matters arise	Reviewing and guiding major plans of action Setting performance objectives Overseeing major capital expenditures, acquisitions and divestitures	In addition to scheduled reports, more comprehensive updates are presented to the Board and relevant Board sub-committees as they arise. These have included, review and approval of Vicinity's Integrated Energy Strategy (and related capital expenditure), overview of Vicinity's climate change approach and assessments, review and approval of sustainability policies (which includes Vicinity's climate policy and environment policy), and public sustainability reporting.
Scheduled – some meetings	Reviewing and guiding major plans of action Reviewing and guiding risk management policies Monitoring implementation and performance of objectives Monitoring and overseeing progress against goals and targets for addressing climate-related issues Other, please specify (Public reporting)	The Risk and Compliance Committee (RCC), a sub-committee of the Board, is responsible for monitoring Vicinity's compliance with sustainability-related laws and regulations, and considering major sustainability policies, programs and commitments from a risk perspective. Annual updates are given to the RCC relating to Vicinity's adherence to publicly available sustainability policies (which includes climate policy and environment policy), compliance with the National Greenhouse and Energy Reporting (NGER) legislation, and review of public reporting of sustainability performance indicators, for example, in the Annual Report and annual sustainability reporting. Additionally, the RCC reviews Vicinity's enterprise risks twice yearly, where climate change has been identified as a material business risk for Vicinity.

## C1.2

**(C1.2) Below board-level, provide the highest-level management position(s) or committee(s) with responsibility for climate-related issues.**

Name of the position(s) and/or committee(s)	Responsibility	Frequency of reporting to the board on climate-related issues
Sustainability committee	Both assessing and managing climate-related risks and opportunities	Not reported to the board
Chief Executive Officer (CEO) <i>The CEO is a member of the Board and the Chair of the Sustainability Committee</i>	Both assessing and managing climate-related risks and opportunities	Not reported to the board
Other C-Suite Officer, please specify (Chief Investment Officer (CIO)) <i>The CIO is a member of the Sustainability Committee, and also under whom Vicinity's group level Sustainability function sits.</i>	Both assessing and managing climate-related risks and opportunities	Quarterly
Other C-Suite Officer, please specify (EGM Shopping Centres) <i>Executive General Manager (EGM) Shopping Centres is a member of the Sustainability Committee.</i>	Both assessing and managing climate-related risks and opportunities	As important matters arise
Other C-Suite Officer, please specify (EGM Development) <i>Executive General Manager (EGM) Development is a member of the Sustainability Committee.</i>	Both assessing and managing climate-related risks and opportunities	As important matters arise
Business unit manager <i>Business Unit Manager is the General Manager Sustainability, who drives the Sustainability strategy and programs at Vicinity. She is also a member of the Sustainability Committee</i>	Both assessing and managing climate-related risks and opportunities	As important matters arise
Business unit manager <i>Business Unit Manager is the General Manager National Operations, who is responsible for driving Vicinity's National Operations strategy and programs.</i>	Both assessing and managing climate-related risks and opportunities	As important matters arise
Risk manager	Both assessing and managing climate-related risks and opportunities	Half-yearly
Environment/ Sustainability manager	Both assessing and managing climate-related risks and opportunities	Not reported to the board
Facility manager <i>Facility managers are Regional Operations Managers (ROMs) for each state and Operations Managers for each centre.</i>	Both assessing and managing climate-related risks and opportunities	Not reported to the board

### C1.2a

**(C1.2a) Describe where in the organizational structure this/these position(s) and/or committees lie, what their associated responsibilities are, and how climate-related issues are monitored.**

Vicinity's Sustainability Committee forms part of our management committee structure and allocates responsibility for Vicinity's sustainability agenda to the highest levels of the organisation. The Committee is chaired by our CEO and Managing Director and includes the Chief Investment Officer (CIO), Executive General Managers of Development and Shopping Centres and several senior leaders. The Committee oversees the implementation of Vicinity's sustainability strategy, which includes the Climate Resilience and Low Carbon programs that drive Vicinity's efforts in climate change adaptation and mitigation.

Vicinity's Group Strategy and Sustainability functions sit under the Chief Investment Officer (CIO), who guides the implementation of the Sustainability program at Vicinity. The CIO reports to the CEO, forms part of Vicinity's Executive Committee and provides updates on Vicinity's Sustainability program (which includes the climate change program) to the Board on a quarterly basis.

The General Manager Sustainability reports directly to the CIO and drives the Sustainability strategy and programs at Vicinity. The General Manager Sustainability regularly presents to the Board and its sub-committees on sustainability matters and initiatives at scheduled meetings and provides updates as matters arise.

The Sustainability Manager reports to the General Manager Sustainability, and implements Vicinity's Climate Resilience and Low Carbon programs, driving continuous improvement in our approach and performance across the business.

Management teams (both Centre Managers and Operations Managers) at our centres are responsible for implementing Vicinity's environmental (Climate Resilience and Low Carbon) and community (Community Significance) sustainability programs on the ground, which includes identifying and managing climate related risks and implementing resource efficiency (energy, waste and water) initiatives to reduce carbon emissions. Additionally, Development Managers for new development projects are responsible for integrating sustainability programs and objectives into the design, planning and construction phases of development projects in line with Vicinity's Sustainable Design Brief.

## C1.3

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### **(C1.3) Do you provide incentives for the management of climate-related issues, including the attainment of targets?**

Yes

## C1.3a

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### **(C1.3a) Provide further details on the incentives provided for the management of climate-related issues.**

#### **Who is entitled to benefit from these incentives?**

Chief Executive Officer (CEO)

#### **Types of incentives**

Monetary reward

#### **Activity incentivized**

Other, please specify (Sustainability strategy & all objectives)

#### **Comment**

The CEO and Managing Director has performance indicators linked to the delivery of the Group Sustainability strategy and objectives, which includes implementation of initiatives under the Low Carbon and Climate Resilience programs. The Low Carbon program includes implementation of an integrated energy strategy that involves an onsite renewable energy and an energy efficiency program, both of which help achieve Vicinity's carbon reduction objectives; the Climate Resilience program aims to understand business risks and build business resilience to the impacts of climate change.

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#### **Who is entitled to benefit from these incentives?**

Corporate executive team

#### **Types of incentives**

Monetary reward

#### **Activity incentivized**

Other, please specify (Sustainability strategy & all objectives)

#### **Comment**

Executive officer is the Chief Investment Officer (CIO). This position reports to the CEO. CIO has a KPI relating to the delivery of the Group Sustainability strategy and objectives. This includes implementation of initiatives under the Low Carbon and Climate Resilience programs (as per the CEO's KPI above).

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#### **Who is entitled to benefit from these incentives?**

Corporate executive team

#### **Types of incentives**

Monetary reward

#### **Activity incentivized**

Other, please specify (Sustainability strategy & all objectives)

#### **Comment**

Executive officer is Vicinity's Executive General Manager Shopping Centres. This position reports to the CEO and has performance indicators relating to progressing Group Sustainability objectives in line with the strategy (which includes objectives set under the Climate Resilience and Low Carbon Smart Assets pillars) and specifically in relation to reduction in energy, waste to landfill (scope 3 emissions), and related costs.

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**Who is entitled to benefit from these incentives?**

Corporate executive team

**Types of incentives**

Monetary reward

**Activity incentivized**

Other, please specify (Sustainability strategy & all objectives)

**Comment**

Executive officer is the Executive General Manager Development. This position reports to the CEO and has a KPI relating to progressing Group Sustainability objectives in line with the strategy (which includes objectives set under the Climate Resilience and Low Carbon Smart Assets pillars).

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**Who is entitled to benefit from these incentives?**

Business unit manager

**Types of incentives**

Monetary reward

**Activity incentivized**

Other, please specify (Sustainability strategy & objectives)

**Comment**

Business unit manager is the General Manager Sustainability. This position reports to the CIO. She has performance indicators relating to: ensuring the internal adoption of energy strategy to deliver on Vicinity's long-term carbon reduction objectives; establishment of annual and long term carbon reduction targets and providing the business with tools to implement; climate risk assessment of centres using Climate Resilience Checklist, assessing the effectiveness of existing controls and identify new controls; developing a Green Star Performance improvement roadmap for portfolio; Completing the annual National Greenhouse and Energy Reporting (NGER) submission ; and publicly reporting Vicinity's annual Sustainability performance.

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**Who is entitled to benefit from these incentives?**

Business unit manager

**Types of incentives**

Monetary reward

**Activity incentivized**

Energy reduction project

**Comment**

Business unit manager is the General Manager Operations. This position reports to the Executive General Manager Shopping Centres and has incentivised performance indicators relating to reduction in energy consumption and achieving operational savings (including related costs from waste to landfill). Furthermore, the General Manager Operations responsibilities (with non monetary recognition) include Vicinity's procurement function and implementing sustainability in our procurement processes with guidance from Vicinity's sustainable procurement policy.

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**Who is entitled to benefit from these incentives?**

Environment/Sustainability manager

**Types of incentives**

Monetary reward

**Activity incentivized**

Other, please specify (Sustainability strategy & objectives)

**Comment**

This encompasses the Sustainability Manager who reports to the General Manager Sustainability. The Sustainability Manager has performance indicators relating to the following: ensuring the internal adoption of Vicinity's internal long-term carbon reduction target (via energy strategy roll out), establishing annual carbon targets (in line with long term carbon reduction target) and providing the business with tools to implement, supporting implementation of environmental improvement program and achievement of energy, water and recycling targets at asset level; Conducting site based climate risk

assessments and quantifying financial impacts of climate change for Vicinity; integrating climate risk into key business decision making processes; and completing the annual National Greenhouse and Energy Reporting (NGER) submission.

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**Who is entitled to benefit from these incentives?**

Facilities manager

**Types of incentives**

Monetary reward

**Activity incentivized**

Energy reduction target

**Comment**

Facility managers are Regional Operations Managers (ROMs) for each state and Operations Managers for each centre. Both Operations Managers and ROMs are supported by National Operations team, and have incentivised performance indicators relating to reduction in energy consumption and waste diversion from landfill (and increasing recycling rates) – both of which achieve reduced carbon emissions. Operations Managers have KPIs relating to asset-specific energy, water and waste reduction targets and projects, and contributing to community wellbeing and supporting community-based initiatives. Operations Managers are charged with implementing emissions reduction and energy efficiency projects, such as lighting retrofits, air-conditioning optimisation and tuning, upgrades to more efficient equipment, and centre recycling programs. Operations managers in Queensland-based centres (where the majority of Vicinity's highest climate risk rated centres are located) have an additional KPI relating to annual assessment of climate risk.

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**Who is entitled to benefit from these incentives?**

Procurement manager

**Types of incentives**

Monetary reward

**Activity incentivized**

Efficiency project

**Comment**

This role is the National Procurement Manager, who reports to the General Manager Operations. National Procurement Manager has a KPI related to achieving procurement and operational cost savings and identifying initiatives that deliver on operational efficiency and other benefits. Additionally, this role is responsible (with non-monetary recognition) for integrating Vicinity's strategic and sustainability objectives into the procurement process (including those relating to operational efficiency).

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**Who is entitled to benefit from these incentives?**

All employees

**Types of incentives**

Monetary reward

**Activity incentivized**

Other, please specify (Various sustainability initiatives)

**Comment**

All employees have incentivised performance indicators relating to sustainability, however, they vary depending on the role and business unit in which they sit. Centre marketing managers have KPIs relating to community investment. During the year, all employees had a KPI relating to customer service/engagement.

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## C2. Risks and opportunities

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### C2.1

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**(C2.1) Describe what your organization considers to be short-, medium- and long-term horizons.**

From (years)	To (years)	Comment
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	From (years)	To (years)	Comment
Short-term	1	3	Business planning cycle time horizons are typically shorter than the time horizons considered in relation to climate change impacts. Our time horizons are based on our business planning cycles, however when investigating our strategy, risks and opportunities around climate change we look longer term (e.g. 2050 and 2090). We base our time horizons on our business/asset planning process. Forecasts are based on a 10-year outlook. Detailed short term objectives are planned for 1-3 year timeframe, which defines our short-term.
Medium-term	3	10	Business planning cycle time horizons are typically shorter than the time horizons considered in relation to climate change impacts. Our time horizons are based on our business planning cycles, however when investigating our strategy, risks and opportunities around climate change we look longer term (e.g. 2050 and 2090). We base our time horizons on our business/asset planning process. Forecasts are based on a 10-year outlook. Medium term objectives are outlined for 3-10 years' timeframe, which considers asset forecasts up to 10 years in asset planning.
Long-term	10	15	Business planning cycle time horizons are typically shorter than the time horizons considered in relation to climate change impacts. Our time horizons are based on our business planning cycles, however when investigating our strategy, risks and opportunities around climate change we look longer term (e.g. 2050 and 2090). For example, Vicinity's high-level portfolio-wide climate risk assessment and scenario analysis on the financial impact of physical risks looked at climate projections out to 2090 which have been acknowledged in our risk assessments, however, these time horizons are extremely long in terms of the business planning process, therefore, difficult to develop appropriate business responses. We base our time horizons on our business/asset planning process. Forecasts are based on a 10-year outlook. Long term means outside of our 10-year business planning horizon. However, our assets themselves have long lifespans, therefore, our climate risk assessments consider longer time horizons beyond 10 years.

## C2.2

### (C2.2) Select the option that best describes how your organization's processes for identifying, assessing, and managing climate-related issues are integrated into your overall risk management.

Integrated into multi-disciplinary company-wide risk identification, assessment, and management processes

## C2.2a

### (C2.2a) Select the options that best describe your organization's frequency and time horizon for identifying and assessing climate-related risks.

	Frequency of monitoring	How far into the future are risks considered?	Comment
Row 1	Six-monthly or more frequently	>6 years	Climate change (adaptation and mitigation) has been identified as a material risk/opportunity within Vicinity's enterprise risk register. Enterprise risks are reviewed and reported to the Board Risk and Compliance Committee every 6 months or more frequently as required. Additionally, Vicinity's long-term investment planning process (referred to internally as 'asset tiering') is conducted every 6 months and considers short, medium and long-term time horizons. Asset tiering process has integrated asset specific risk ratings that consider each asset's exposure to various climate related risks (informed by our portfolio-wide high-level climate risk assessment). The climate risk rating is assessed alongside other asset and catchment metrics to determine Vicinity's long-term investment plan for the asset. Our annual Strategic Asset Plans for each asset have integrated strategic sustainability objectives on carbon mitigation, which are reviewed quarterly to ensure objectives are being achieved

## C2.2b

### (C2.2b) Provide further details on your organization's process(es) for identifying and assessing climate-related risks.

Climate change was identified as a material risk for Vicinity through the materiality review conducted in 2016, and was later included in our enterprise risk register, which is reported to the Board Risk and Compliance Committee every six months. Our material risks (including climate change) are assessed and managed using the Enterprise Risk Management Framework, which considers strategic, operational, compliance and financial risks for our business. It uses a consequence/likelihood matrix to assess and prioritise all business risks.

Since 2015, Vicinity has had a program of work to improve our understanding of the potential risks and opportunities related to climate change, both at a corporate and asset level.

## Physical risks

## **Portfolio wide high-level climate risk assessment**

In 2016, we conducted an initial high-level risk assessment of the physical climate risks for each of our centres against projected long-term Australian climate variables under different climate change scenarios. The scenarios selected were based on an emissions trajectory that considers levels that current global and Australian policy and targets would achieve (RCP 4.5), and a scenario of no real action towards mitigating climate change (RCP 8.5), to demonstrate a range of potential temperature increases, their effect on climate variables, and resulting impact on our asset portfolio. We assessed the risk to our centres against 7 key climate variables using CSIRO climate projections from the natural resource management regions (NRMs), including flooding, heatwave, utility loss, bushfire, hail, cyclonic damage, and strong winds under the two selected scenarios. We also considered other characteristics including valuation and age of the centre when finalising the risk rating and prioritisation.

### **Detailed resilience assessments**

To get a more detailed understanding of the climate risks and resilience of our assets, in 2017 we developed a climate resilience checklist, to identify specific risk areas, current adaptation measures, and potential future measures to be implemented. The checklist was piloted at Whitsunday Plaza to further refine our approach. By June 2018, detailed resilience assessments using this checklist had been completed at all 15 centres rated as highest risk in the high-level assessment above, with a plan to continue detailed assessments on the next group of priority centres by June 2019, and have the whole portfolio assessed by 2020.

### **Review of business decision making processes**

In 2017, we completed a review to understand how climate risk is considered in Vicinity's key decision-making processes to identify where we could integrate and enhance climate change considerations to strengthen our management of risks. This process involved extensive internal stakeholder engagement to understand existing processes, including across group strategy, capital transactions, risk management, insurance, investment management, emergency management, operations and developments. The findings concluded that while Vicinity already considers climate change risk in our key decision making processes, opportunities exist to strengthen our approach and ensure a consistent method for assessing and managing climate resilience is taken across the business. Based on this, we developed a series of recommendations (which are currently being implemented) to strengthen climate risk considerations/resilience within abovementioned corporate processes.

### **Financial impact assessment**

In 2018, Vicinity completed a further piece of work to understand the financial impacts and sensitivities to our business and asset portfolio resulting from climate-related physical risks under 2 climate scenarios (RCP 4.5 and RCP 8.5) to identify those risks and opportunities most likely to have the greatest impact. This assessment built on climate risk profiles (from our earlier risk assessments) and historical cost data (e.g. insurance costs, maintenance and repair costs) related to past climate events, and used future cashflow forecasts to model the potential impact to net present value of future profits under the selected climate change scenarios.

## **Transition risks**

### **Modelling to understand decarbonisation pathways**

As part of our program to understand transition risks, in 2016 we conducted modelling to identify possible decarbonisation pathways for our asset portfolio and better understand the resulting implications for Vicinity based on different decarbonisation scenarios for Australia. The modelling considered a variety of risk types such as current and potential future legislation, market forces and introduction of new energy efficiency/renewable energy technologies. It assisted in setting an emissions reduction trajectory and roadmap for Vicinity in the short, medium and long term. Vicinity's Integrated Energy Strategy maps out a long-term program for managing energy use and carbon emissions across our portfolio, including a rapid onsite renewable energy and energy efficiency program.

## C2.2c

### **(C2.2c) Which of the following risk types are considered in your organization's climate-related risk assessments?**

	<b>Relevance &amp; inclusion</b>	<b>Please explain</b>
Current regulation	Relevant, always included	Climate risks and opportunities are assessed using Vicinity's enterprise risk management framework, which considers regulatory risks (among other risks) such as those that result in non-compliance incidents, increased regulatory oversight, fines or legal action. As current regulation tied to managing the impacts of climate-related risks varies both nationally and from state-to-state, Vicinity's portfolio wide high-level climate risk assessment (completed in 2016) considered organisational capability to respond to short-, medium-, and long-term climate risks in the context of uncertainty around current policy guidance. This is reflected by the selection of 2 different RCPs (4.5 and 8.5) to support the assessment process. Additionally, our modelling to understand decarbonisation pathways for Vicinity considered the impact of no / delayed changes to current Australian energy/carbon and climate regulations on our business in terms of the associated cost implications.

	Relevance & inclusion	Please explain
Emerging regulation	Relevant, always included	As above, climate risks and opportunities are assessed using Vicinity's enterprise risk management framework, which considers regulatory risks (both current and future) such as those that result in non-compliance incidents, increased regulatory oversight, fines or legal action. Our modelling to understand decarbonisation pathways considered potential changes to Australia's energy and climate policy, including federal and state government commitments to emissions reductions and renewable energy targets, and decarbonisation of the national electricity grid, and resulting impact on wholesale electricity prices. Additionally, as current regulation tied to managing the impacts of climate-related physical risks varies both nationally and between jurisdictions, Vicinity's portfolio wide high-level climate risk assessment (completed in 2016) considered organisational capability to respond to short-, medium-, and long-term climate risks in the context of uncertainty around current policy guidance.
Technology	Relevant, always included	Our modelling to understand decarbonisation pathways for Vicinity considered the impact that future advances in technology will have on the viability and overall level of ambition of a long-term emission reduction plan for our business, including the risks and opportunities that this may bring. Some of the technological changes considered included the rapid advancement and commercialisation of low carbon technologies (for example, as global action on climate mitigation drives innovation), building materials with embedded solar generation capacity, zero-gas heating and reverse cycle commercial sized chillers, increased automation, increased electrification and digitisation, and the resulting impact on energy use and demand in the long term. Additionally, Vicinity's National Operations team's innovation strategy looks at research and development and rolls out new technology trials across the portfolio that address operational challenges and efficiencies, and also deliver sustainability outcomes related to reducing our energy use, waste to landfill and carbon emissions.
Legal	Relevant, always included	Climate risks and opportunities are assessed using Vicinity's enterprise risk management framework, which considers legal risks (among other risks). These may include risks that could result in regulatory inquiries, reportable incidents, compliance incidents, increased regulatory oversight, significant fines, legal action, loss of licence or penalties on directors. Vicinity's portfolio wide high-level climate risk assessment (completed in 2016) considered organisational capability to respond to short-, medium-, and long-term climate risks in the context of uncertainty around current policy guidance, as well as changes to future policy and regulatory action to mitigate climate change, including enhanced emissions reporting obligations, mandatory energy efficiency targets and importantly, legal implications for not considering and providing appropriate disclosures on climate change related risks.
Market	Relevant, always included	Climate risks and opportunities are assessed using Vicinity's enterprise risk management framework, which considers market related risks that could impact our retail tenants, consumer behaviours, our operations and income. Through this risk framework, we consider the impact of climate-related risks and opportunities on operational expenses, consumer behaviours (such as shopping centre visitation during extreme weather events, seasonal variability in shopping preferences), on sales of our retail tenants, and as a result the potential impacts on income for Vicinity. We specifically consider other market-related risks such as the rising cost of electricity and energy and the impact that might have on our business operates. Our modelling to understand decarbonisation pathways for Vicinity along with forecasts modeled during the development of our Integrated Energy Strategy have assessed the potential cost implications of rising wholesale electricity prices on our operations, flow on impacts to our onselling of electricity to our tenants, and the financial viability of investment in onsite renewable energy, such as solar.
Reputation	Relevant, always included	Climate risks and opportunities are assessed using Vicinity's enterprise risk management framework, which considers reputational risks (among other risks), particularly those that can impact our brand at a centre, regional, or national level. Additionally, our modelling to understand decarbonisation pathways for Vicinity considered the potential reputational benefits of high visibility emissions reduction initiatives such as installation of onsite solar, high energy efficiency equipment and strong NABERS Energy and Green Star ratings, all of which can be easily seen by our consumers and retailers. This can result in positive association for consumers with the Vicinity brand as well as individual centres where such initiatives are prominent or becoming a partner of choice for sustainability-minded retailers resulting in possible higher rental returns. We also consider the potential negative reputational impacts of climate-related risks, such as our inability to respond to rising expectations relating to climate change at a corporate level or be adequately prepared for the physical impacts of climate change at an asset level, that could lead to reduced demand for our products and services and therefore, loss of revenues.
Acute physical	Relevant, always included	Acute physical risks arising from extreme weather events such as cyclones, flooding, bushfires, strong winds, heatwaves and hail events are assessed using Vicinity's enterprise risk management framework in the context of strategic, operational and financial risks for our business on an ongoing basis. Vicinity's portfolio-wide high-level climate risk assessment (completed in 2016) assessed the exposure of all assets in our portfolio to acute physical risks from cyclones, flooding, bushfires, strong winds, heatwaves, hail and utility loss. In addition, detailed resilience assessments using our climate resilience checklist, which applies a consistent and comprehensive approach to understanding asset specific climate resilience risks and the identification of appropriate adaptation strategies, was rolled out to our highest risk rated assets (15 centres) in the 12 months up to 30 June 2018, with the remainder of our asset portfolio to be completed by 2020. Furthermore, in 2018 we conducted a financial impact assessment to model the potential financial impacts and sensitivities related to acute (and chronic) physical risks to Vicinity under two climate change scenarios (RCP 4.5 and RCP 8.5). This initial and very high level financial assessment estimated that the potential impact to our business from acute physical risks is approximately \$53 million in net present value (NPV) of future profits across the portfolio over 10 years. This figure is based on a theoretical assessment of the potential impacts to Vicinity's existing managed portfolio (81 assets), and management is currently, or has plans in place to proactively manage this impact moving forward. We will continue to further investigate and refine our understanding of the potential financial impacts of climate change to our business, and as part of this work will challenge the assumptions made in our initial assessment.
Chronic physical	Relevant, always included	Chronic physical risks arising from climate change are assessed using Vicinity's enterprise risk management framework in the context of strategic, operational and financial risks for our business on an ongoing basis. Vicinity's portfolio-wide high-level climate risk assessment (completed in 2016) assessed the exposure of all assets in our portfolio to risks such as increasing frequency and intensity of heatwaves, cyclones, strong winds, bushfires, and flooding. In addition, detailed resilience assessments using our climate resilience checklist, which applies a consistent and comprehensive approach to understanding asset specific climate resilience risks and the identification of appropriate adaptation strategies, was rolled out to our highest risk rated assets (15 centres) in the 12 months up to 30 June 2018, with the remainder of our asset portfolio to be completed by 2020. Furthermore, in 2018 we conducted a financial impact assessment to model the potential financial impacts and sensitivities related to chronic (and acute) physical risks to Vicinity under two climate change scenarios (RCP 4.5 and RCP 8.5). This initial and very high level financial assessment estimated that the potential impact to our business from chronic physical risks is approximately \$190 million in net present value (NPV) of future profits across the portfolio over 10 years. This figure is based on a theoretical assessment of the potential impacts to Vicinity's existing managed portfolio (81 assets), and management is currently, or has plans in place to proactively manage this impact moving forward. We will continue to further investigate and refine our understanding of the potential financial impacts of climate change to our business, and as part of this work will challenge the assumptions made in our initial assessment.

	Relevance & inclusion	Please explain
Upstream	Relevant, always included	As outlined in 'Market' risks above, we consider upstream risks such as increased cost of inputs including energy, and the resulting financial impact on our business. Our modelling to understand decarbonisation pathways for Vicinity along with forecasts modeled during the development of our Integrated Energy Strategy, have assessed the potential cost implications of rising wholesale electricity prices on our operations, flow on impacts to our onselling of electricity to our tenants, and the financial viability of investment in onsite renewable energy, such as solar. We also consider supply chain and upstream exposure to climate change risks for other inputs into our business, such as construction practices and building materials used in our development projects (e.g. concrete, steel, timber). In 2018 we completed a supply chain category risk assessment, which identified priority areas for climate change (environmental) risks in our supply chain, with particular focus on reducing embodied carbon from our construction materials including concrete, steel and other building materials and products, the requirements for which are specified in our Sustainable Design Brief (SDB).
Downstream	Relevant, always included	Climate risks and opportunities are assessed using Vicinity's enterprise risk management framework, which considers strategic, financial and operational risks that impact on our stakeholders downstream – this includes our retail tenants' operations, customer visitation and retail sales, which in turn impacts Vicinity's revenues. For example, Vicinity's portfolio-wide high-level risk assessment and detailed resilience assessments have assessed the exposure of all assets in our portfolio to acute and chronic physical risks such as cyclones, strong winds, flooding, hail, bushfires and heatwaves, including historical and potential future disruptions such events might have on tenant operations and sales, customer visitation. Our investigations have also established that our centres often serve as places of refuge for local communities during times of extreme weather, and events such as heatwaves often result in increased foot fall at centres as a result of consumers taking refuge from the heat. If appropriately managed, such events can be leveraged to further support tenant retail operations and consumer spending. We have also considered how transition risks/opportunities such as increased costs of energy can flow on to our tenants, and how we can assist in mitigating such price increases by improving the energy efficiency of our buildings and generating our own onsite renewable energy. Furthermore, we are investigating how climate change could modify consumer behaviours and how this could impact the success of our retailer partners.

## C2.2d

### (C2.2d) Describe your process(es) for managing climate-related risks and opportunities.

Our climate risk investigation work to date (high level portfolio-wide climate risk assessment, detailed resilience assessments at all highest-risk rated assets, and a review of our major business decision making processes to understand how climate risk is currently considered - summarised in C2.2b), has identified a detailed plan of activities (currently being implemented) to embed and strengthen climate risk considerations across our most relevant business processes and systems. Climate change adaptation and mitigation management measures are implemented via a program of work led from the 'Climate resilience' and 'Low Carbon Smart Assets' pillars of Vicinity's Sustainability Strategy. Under these pillars, we have embedded short, medium and long-term climate change objectives and measures to increase asset resilience to a changing climate (adaptation) and measures to reduce our own impact on the climate (mitigation - lowering our carbon emissions) into our key business processes as described below:

1. Strategic Asset Plans (SAP) integrate climate change adaptation strategies and carbon reduction targets into overall strategic objectives for the asset. SAPs are updated annually and include both short and medium term direction and objectives for each asset;
2. Sustainable Design Brief integrates climate change objectives (such as resilience measures, carbon reduction initiatives and targets) and provides implementation guidance to integrate these requirements into our development projects and capital upgrades;
3. Asset investment planning process integrates asset specific climate resilience risk (using Vicinity's risk management framework) and carbon performance scoring into asset analysis and future planning;
4. Integrated energy strategy provides a staged, long-term plan for implementing onsite renewable energy program and efficiency measures into operations, development projects and capital upgrades to achieve operational efficiencies and long-term carbon reductions;
5. Climate resilience and adaptation plans were developed for the highest risk rated centres (total of 15 assets) in 2018 through completion of Vicinity's climate resilience checklist to identify relevant mitigation and resilience measures specific to each asset. The remaining assets will be targeted for completion by 2020;
6. Asset level risk registers include and assess relevant climate-related risks for each asset;
7. Crisis and emergency plans and incident response procedures were reviewed and updated for a number of natural perils following the occurrence of Cyclone Debbie in 2017 in Queensland, to include lessons learned and inform response to future disasters/events.

## C2.3

### (C2.3) Have you identified any inherent climate-related risks with the potential to have a substantive financial or strategic impact on your business?

Yes

## C2.3a

**(C2.3a) Provide details of risks identified with the potential to have a substantive financial or strategic impact on your business.**

**Identifier**

Risk 1

**Where in the value chain does the risk driver occur?**

Direct operations

**Risk type**

Physical risk

**Primary climate-related risk driver**

Acute: Increased severity of extreme weather events such as cyclones and floods

**Type of financial impact driver**

Other, please specify (Multiple impact drivers (see Comment))

*Multiple financial impact drivers - Increased operating costs, increased capital costs, reduced revenues from lower sales/output, increased insurance premiums*

**Company- specific description**

Climate projections indicate that the frequency and severity of tropical cyclones, hurricanes, storms and tidal surges are expected to rise due to increasing global temperatures. Some parts of Australia, such as Queensland and northern New South Wales, are particularly vulnerable to the impacts of both tropical and extra tropical cyclones, which have shown to impact on the operating conditions for shopping centres in these areas. Impacts for Vicinity include, physical damage to the buildings, power outages and reductions in physical connectivity of shopping centres, as well as potential health hazards to staff and the public. These impacts can disrupt our centre operations, leading to increased maintenance, repair and recovery costs, increased staff costs for incident/disaster response, health and safety expenditure, as well as increased capital replacement costs. In addition to physical impacts to properties, these extreme events can also disrupt the centre operations, impacting our customers and retail tenants.

**Time horizon**

Short-term

**Likelihood**

Very likely

**Magnitude of impact**

Medium-low

**Potential financial impact**

53000000

**Explanation of financial impact**

\$53 million in net present value reduction over 10 years - The financial impact to Vicinity was estimated under an acute shock scenario. This considers the impact of acute events such as cyclones, floods, high winds (modelled based on each asset's exposure and sensitivity to these events under RCP 4.5 and RCP 8.5 scenarios) on asset income and expenses, including rental income, rental abatement, ancillary income, maintenance and repair costs, power costs and any hardware replacement costs. This figure is based on a theoretical assessment of the potential impacts to Vicinity's existing managed portfolio (81 assets), and management is currently, or has plans in place to proactively manage this impact moving forward. We will also continue to further investigate and refine our understanding of the potential financial impacts of climate change to our business, and as part of this work will challenge the assumptions made in our initial assessment.

**Management method**

We continually assess asset level climate risks and integrate resilience measures into each centre's annual and long-term investment planning. In 2016, we completed a portfolio wide high-level climate risk assessment based on national climate change projections, considering extreme weather events to identify asset risk profiles. We then developed a site climate resilience checklist to roll out consistent detailed risk assessments across the 15 highest risk-rated centres and identify inherent risks and appropriate resilience measures (completed during 2018). Identified measures have been integrated into each assets' Strategic Asset Plans, which informs operational and capex budgets. We also completed a review of all major business decision making processes to understand how climate risk is currently considered. A list of resulting recommendations is currently being implemented to improve risk and resilience considerations in our business processes. Our enterprise and asset-level risk registers regularly assess climate risks and mitigation measures. We have updated crisis and emergency plans to better prepare for/improve our response to natural disasters. Climate risk is now one of many factors considered in our investment tiering process, used to determine each asset's investment/development potential. Our Sustainable Design Brief incorporates climate resilience objectives and measures into development projects.

## Cost of management

95000

## Comment

\$95,000 per year in cost of management includes the annualised cost of our climate resilience program (over 3 years), including our portfolio-wide high-level climate risk assessment, detailed resilience assessment at Whitsundays Plaza (including the development of a climate resilience assessment checklist that was rolled out at our highest risk rated (15) assets), review of major business processes, and financial impact assessment under various physical climate change scenarios. We have also included integrating climate resilience into our Sustainable Design Brief, which was developed in 2017 as well as the specific Climate Adaptation and Resilience Plan completed in December 2017 for The Glen Development. The integration of risk considerations and resilience measures into key business decision making processes and activities has not incurred additional costs to date, as they are executed as part of the roles of current Vicinity employees.

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## Identifier

Risk 2

## Where in the value chain does the risk driver occur?

Direct operations

## Risk type

Physical risk

## Primary climate-related risk driver

Chronic: Rising mean temperatures

## Type of financial impact driver

Other, please specify (Multiple impact drivers (see Comment))

*Multiple financial impact drivers - Increased operating costs, increased capital costs, reduced revenues from lower sales/output, increased insurance premiums*

## Company- specific description

Operations during temperature extremes (heat waves, extreme cold days) can result in excess demand on HVAC systems, reducing their lifespan and bringing forward expected capital outlays. If plant is unable to operate as designed due to increased mean temperatures and / or temperature extremes, Vicinity may not be able to maintain adequate levels of tenant and consumer comfort and satisfaction, potentially leading to a reduction in customer visitation, tenant sales, and therefore rent from tenants. Higher temperatures and humidity can also cause physical damage to the building envelope and increase our maintenance costs. Prolonged periods of extreme temperatures increase energy costs and put pressure on energy demand, which may cause electricity networks to either have power failures or outages, impacting our centres' ability to remain open for trade, and requiring the centre to use back up power generation.

## Time horizon

Medium-term

## Likelihood

Likely

## Magnitude of impact

Medium

## Potential financial impact

190000000

## Explanation of financial impact

\$190M reduction in net present value of future profits over 10 years - The financial impact to Vicinity relates to increased energy consumption and energy demand (coupled with increasing electricity prices), the cost of HVAC systems maintenance and replacement, and costs to repair any damages to the buildings. This was modelled based on the exposure and sensitivity of each asset to increases in the number of days of temperatures exceeding 35°C under RCP8.5 and RCP4.5 scenarios and could range between \$149M to \$190M over the next 10 years. This figure is based on a theoretical assessment of the potential impacts to Vicinity's existing managed portfolio (81 assets), and management is currently, or has plans in place to proactively manage this impact moving forward. We will continue to investigate and refine our understanding of the potential financial impacts of climate change to our business, and as part of this work will challenge the assumptions made in our initial assessment

## Management method

Rising mean temperatures and more frequent extreme temperature days was identified as a material climate risk for our operations through the portfolio-wide high-level climate risk assessment conducted in 2016. Since then, Vicinity has been working to build our resilience by reducing the heat load to reduce the excess demand on our HVAC systems. In our asset planning, we identify old HVAC systems that are failing or coming to their end of life and specify better sized and more efficient units to be installed during capital upgrades that can operate longer and at higher capacity on extreme hot days. In

our development projects and refurbishments, we also identify upgrades required to building fabric through our Sustainable Design Brief to reduce the heat load and better manage rising temperatures. Vicinity has also established an Integrated Energy Strategy, which includes onsite renewable energy and scaled-up energy efficiency measures across our portfolio, that will help reduce our overall energy consumption and maximum energy demand from the electricity grid. As a part of this strategy, we commenced Stage 1 of our onsite renewable energy program in FY18, which includes solar installations at five centres across South Australia and Western Australia, at a cost of \$28M. Stage 2 will commence in FY19 and will include approximately a \$50M investment.

#### **Cost of management**

47500000

#### **Comment**

\$47.5M in annual cost of management includes the annualised cost of our climate resilience program (over 3 years), including portfolio-wide high-level climate risk assessment, detailed resilience assessment at Whitsundays Plaza (including the development of a climate resilience checklist rolled out to 15 highest risk assets), review of major business decision making processes and financial impact assessment under various physical climate change scenarios. Costs also include the work to integrate climate resilience into our Sustainable Design Brief and capital investment (Vicinity spends approximately \$15M per year on upgrading end of life HVAC equipment with new more efficient equipment and in 2017 invested approximately \$4.5M in energy efficiency projects). We also spent approximately \$450,000 in energy management services (such as energy audits). We've included Stage 1 of our solar program which includes a \$28M investment in solar across five centres, commenced in FY18.

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#### **Identifier**

Risk 3

#### **Where in the value chain does the risk driver occur?**

Direct operations

#### **Risk type**

Transition risk

#### **Primary climate-related risk driver**

Policy and legal: Enhanced emissions-reporting obligations

#### **Type of financial impact driver**

Policy and legal: Increased operating costs (e.g., higher compliance costs, increased insurance premiums)

#### **Company-specific description**

Vicinity participates in a range of mandatory and voluntary reporting related to our emissions performance, as well as our current approach to climate change risk/opportunity management. Vicinity is required to comply with the National Greenhouse and Energy Reporting (NGER) Act 2007 as part of our emission reporting obligations to the Australian Government. In addition, there are increasingly greater emissions related reporting obligations driven by both the government and investment community. For example, the Commercial Building Disclosure (CBD) Program requires energy efficiency information to be provided when commercial office space of 1000 m<sup>2</sup> or more is offered for sale or lease. A recent review of the program included recommendations to extend the program to other asset types, such as hotels and retail, however this has not yet been implemented. If these recommendations are extended to the retail sector, Vicinity will need to comply by completing NABERS Energy assessments for our retail assets. Proposed changes to the 4th edition of the ASX Corporate Governance Principles and Recommendations (currently under consultation) will additionally require (if successful) listed entities with material exposure to climate change risk to implement the recommendations of the TCFD. If this recommendation comes into effect, Vicinity will be required to disclose our approach to managing climate-related risks and opportunities and emissions performance through our Annual Report. Furthermore, investors are increasingly seeking more granular information about direct and indirect carbon emissions impacts of businesses, assets and our tenants. Specifically, investor surveys such as the Global Real Estate Sustainability Benchmark (GRESB), CDP and Dow Jones Sustainability Index (DJSI) require that we disclose our Scope 1, 2 and 3 emissions related to our direct operations and tenants, and this information is utilised to assess the overall sustainability performance of our portfolio. Therefore, to avoid fines and penalties in the case of mandatory reporting and also to enhance our reputation amongst our investors, this risk requires Vicinity to ensure it has robust systems in place to collate, analyse and report data. As a property company, we continuously monitor new emissions reporting obligations, legal and inferred, that would have an impact on our operations.

#### **Time horizon**

Current

#### **Likelihood**

Virtually certain

#### **Magnitude of impact**

Low

#### **Potential financial impact**

**Explanation of financial impact**

\$690,000 per year in potential impact - Financial implications are now considered part of business as usual as we have been collating, analysing and reporting energy and carbon performance data for a number of years. Potential for financial penalties for noncompliance with the NGER Act are in the order of \$340,000 for a given year. Furthermore, if the CBD program is extended to retail assets in the future, it will require the roll out of NABERS energy assessments across our portfolio, which would cost approximately \$350,000 per year. Investor sustainability reporting through surveys such as CDP, DJSI and GRESB are currently voluntary, and therefore does not result in any additional financial impact.

**Management method**

Vicinity's approach is to maintain robust internal systems to collect, analyse and report our environmental performance data. An environmental data management system has been established to manage such reporting requirements. It sits within Vicinity's broader data management system and is managed internally by Vicinity's Information Technology (IT) department. The data are hosted under an external cloud platform, for which Vicinity pays an annual subscription fee. Furthermore, we engage an external assurance provider to undertake third party verification of our NGER submission, which was submitted for the full group by the due date in October 2017. Vicinity also uses NABERS and Green Star Performance assessments to benchmark our assets (and their emissions performance) and drive improvements. We do this proactively, setting targets for increasing both the coverage of assessments and our average portfolio-wide ratings, so that we can be ahead of the curve if any further certification legislation is introduced. Vicinity also reports our environmental performance (including Scope 1, 2 and 3) emissions to our investors through investor surveys such as the CDP, GRESB and DJSI, as well as through our Annual Report and sustainability website annually, and have aligned our public reporting with the TCFD Recommendations.

**Cost of management**

800000

**Comment**

\$800,000 per year in cost of management includes the annualised costs (over 3 years) of running and maintaining our internal environmental data system (EDS) (which sits within Vicinity's broader data management system) including data capture, data management costs and system upgrades. We have also included the cost of undertaking external assurance of our NGER submission, annual sustainability reporting, investor sustainability surveys, and the cost of participating in above-mentioned investor surveys. Furthermore, the certification and assessment of our centres for NABERS and Green Star Performance ratings is approximately \$300,000 for the portfolio on an annual basis.

**Identifier**

Risk 4

**Where in the value chain does the risk driver occur?**

Direct operations

**Risk type**

Transition risk

**Primary climate-related risk driver**

Policy and legal: Mandates on and regulation of existing products and services

**Type of financial impact driver**

Policy and legal: Increased operating costs (e.g., higher compliance costs, increased insurance premiums)

**Company- specific description**

The Australian Building Codes Board (ABCB) is a joint government/industry organisation that promotes efficiency in the design, construction, performance and liveability of buildings through the National Construction Code (NCC) and includes issues relating to safety, health, amenity, accessibility and sustainability in buildings. The ABCB has been requested to consider potential stringency changes to the energy efficiency provisions in relation to commercial buildings (referred to as Section J) as proposed by the National Energy Productivity Plan (NEPP) Work Plan to facilitate Australia meeting its commitment under the Paris Agreement. Section J has not been updated since 2010, so potential updates could mean a significant step change in the minimum requirements for energy efficiency in new buildings. The proposed changes would result in an average greenhouse gas reduction of approximately 29% from existing minimum standards, and for retail it would be between 10-20%. The updates are currently going through public consultation and final recommendations, but if passed, would be legislated from late 2019 onwards. Furthermore, the Australian Sustainable Built Environment Council (ASBEC) 'Built to Perform' report plans out how the minimum energy performance requirements in the National Construction Code should increase over time to reduce emissions and provide longer-term regulatory certainty for industry. Given the ongoing advocacy, this would mean that energy efficiency provisions in the NCC would be set and gradually increase in stringency overtime. Also, changes to general planning regulations may increase requirements on climate impact assessments and adaptation and resilience planning as part of development planning provisions, particularly relating to flooding risk and stormwater management, but may extend into other climate impacts. This increases the risk of project delays due to increased requirements for planning approvals and/or additional costs for technical assessments and new asset design response.

**Time horizon**

Short-term

**Likelihood**

More likely than not

**Magnitude of impact**

Low

**Potential financial impact**

20000000

**Explanation of financial impact**

\$20M per year in additional development costs based on our 2019 pipeline - Impact of more stringent energy efficiency provisions would be in additional construction costs for new developments to meet increased design and technology requirements. Cost impacts of the 2019 NCC Section J update are still being assessed, and there is significant uncertainty around design responses, architectural preferences and pricing assumptions. Based on an average cost of development and NCC's Regulation Impact Statement (which estimates costs to the economy if proposed changes to NCC are adopted), the increase in construction cost is expected to be 1-2%. This and will be proactively addressed by management if proposed changes are adopted. Costs are expected in relation to changes in climate risk planning regulations and resulting requirements for design responses and resilience measures, which are difficult to quantify and would be specific to each planning authority jurisdiction.

**Management method**

Vicinity has integrated best practice sustainability standards into the way we design and construct development projects through the Sustainable Design Brief (SDB), which has a focus on Low Carbon smart assets and high energy efficiency standards, as directed through our Sustainability strategy. Comparing our current developments, and the outcomes specified in the SDB, our assessments show that we currently build above the provisions required by the 2016 code and would already meet the new provisions set out in the proposed changes to Section J for the 2019 update to the NCC. Therefore, Vicinity does not expect the proposed update of the NCC to have a significant cost impact, as Vicinity typically takes a best practice approach to the design and construction of our centres rather than building only to minimum standards. Furthermore, to monitor and direct the proposed changes to the NCC, Vicinity has directly contributed to their revision through our membership of the Property Council of Australia (PCA) who have established a working group through which their member base can provide input into the PCA's public response to the proposed changes. The SDB also requires projects to consider climate risk in all new developments and integrate resilience and adaptive planning in the design of the project. The requirements are aligned with best practice guidelines from the Green Building Council of Australia's (GBCA) Green Star sustainable building rating tools.

**Cost of management**

40000

**Comment**

\$40,000 represents the annual costs incurred through our management approach to the proposed updates in energy efficiency provisions under Section J of the 2019 NCC is through engagement in the PCA's NCC working groups using internal resources, and the development of our Sustainable Design Brief.

**Identifier**

Risk 5

**Where in the value chain does the risk driver occur?**

Direct operations

**Risk type**

Transition risk

**Primary climate-related risk driver**

Market: Uncertainty in market signals

**Type of financial impact driver**

Market: Increased production costs due to changing input prices (e.g., energy, water) and output requirements (e.g., waste treatment)

**Company- specific description**

The Australian Government's proposed energy policy - the National Energy Guarantee (NEG) scheme, developed by the COAG Energy Council and Energy Security Board (ESB), aims to provide a platform for putting downward pressure on Australia's energy markets while including emissions reduction and energy reliability requirements. The emissions target within the proposed policy is 26% reduction on 2005 levels by 2030, to be achieved by a gradual increase in emissions reduction over time. Australia also has a commitment under the Paris Climate Agreement to achieve net zero carbon emissions by 2050, but no strategy beyond 2030 to meet this target is evident. The policy has not yet been finalised, therefore the exact impact remains unknown. It has created a landscape of uncertainty surrounding an implicit price on carbon, available funding for

carbon abatement and renewable energy activities, the cost effectiveness of onsite renewable energy generation, carbon accounting methodologies and the role of external carbon offsets. Whilst the impact of the NEG on wholesale electricity prices remains uncertain, Australia has continued to experience increases in wholesale electricity prices. Given the majority of Vicinity's electricity is sourced from external energy sources via the national grid, any legislative changes that impact wholesale electricity prices will have a significant impact on Vicinity's operational costs, especially in the short term (prior to the roll out of our onsite solar program). Additionally, Vicinity derives ancillary income from onselling electricity to our retail tenants at the centre and any increases in grid electricity prices would result in reduced profit margins derived from this income source.

**Time horizon**

Short-term

**Likelihood**

Likely

**Magnitude of impact**

Low

**Potential financial impact**

3000000

**Explanation of financial impact**

\$3M per year in energy costs - A potential increase in electricity prices would increase the cost of electricity for Vicinity. Australia's previous price on carbon aimed to achieve similar emission reduction targets to the NEG and caused an increase of approximately 10% to wholesale energy prices. If this reoccurred would incur approximately \$3M/year in additional costs and is an important consideration in management's long-term financial planning. Based on our modelling, a 2.4% annual increase in electricity prices could increase Vicinity's energy costs by approximately \$750,000/year. Treatment of behind-the-meter onsite solar is uncertain based on current NEG policy design. If it falls under the NEG, there may be cost impacts to these projects that would dramatically change the business case for investing in solar. Additional time and effort will be required to assess regulatory impacts and the feasibility of onsite renewable energy to offset potential electricity price increases.

**Management method**

Our approach is to take a long-term view on energy management to ensure that our business is resilient to variability/increase in grid electricity prices. In 2016, we completed modelling to identify the impact of changes in the electricity market/prices to our business, which identified the significant commercial benefits of investing in onsite renewable energy and energy efficiency technologies, should legislative changes be introduced in favour of renewable energy/climate change mitigation. Vicinity has developed an Integrated Energy Strategy to provide a long-term energy management approach for the business. It involves onsite renewable energy and an energy efficiency program to minimise the impacts of electricity price increases and lower our carbon emissions. Stage 1 of this program commenced in FY18, including solar installations at 5 centres at a total cost of \$28M. Stage 2 will commence in FY19 and include an investment of \$50M. We also drive year-on-year improvements in asset energy efficiency to reduce our exposure to future volatility and increases in electricity prices, and additionally implement significant energy and carbon reduction measures in our development projects through our Sustainable Design Brief. Vicinity has directly contributed to the NCC revision through our membership of the Property Council of Australia who have established a working group through which their member base can provide input into the PCA's public response to the proposed changes.

**Cost of management**

33000000

**Comment**

\$33M includes the annual cost of development of our long-term energy and carbon strategies. In terms of energy efficiency, Vicinity invested approximately \$4.5M on energy efficiency projects, and approximately \$450,000 in energy management services in 2017. We've also included Stage 1 of our onsite renewable energy program, which commenced in FY18 and includes an investment of \$28M in renewable energy. Monitoring legislative changes is incorporated into the broader work of the Sustainability team, which is estimated at approximately \$10,000 per year.

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**Identifier**

Risk 6

**Where in the value chain does the risk driver occur?**

Customer

**Risk type**

Transition risk

**Primary climate-related risk driver**

Market: Changing customer behavior

**Type of financial impact driver**

Market: Reduced demand for goods and/or services due to shift in consumer preferences

#### Company- specific description

Globally and in Australia, recent studies show that variability in seasonal temperature (i.e. longer/shorter winters and summers) are starting to affect consumer purchasing behaviours and the traditional sales cycles of retailers offering seasonal goods. For example, prolonged summers and warmer winters have impacted on the profitability of Australian clothing retailers selling seasonal clothes such as outerwear, resulting in excess winter stock and unplanned discounting in order to move stock. While we believe the retailers will adjust the timing of seasonal ranges to ensure their inventory demand planning is geared for variability in seasonal temperature, any adverse impacts that affect the annual retail sales of Vicinity's tenants create a potential risk to rental income for our assets. Additionally, global studies on consumer behaviours and retail trends show the rise of conscious consumerism, as consumers seek to purchase more sustainable/ethical products and ask for greater transparency from retailers on their environmental footprint. The rise of conscious consumerism is a transition risk impacting the whole retail industry and therefore our tenants, which our retailers are responding to, and will have an indirect impact to Vicinity.

#### Time horizon

Medium-term

#### Likelihood

Likely

#### Magnitude of impact

Medium-low

#### Potential financial impact

#### Explanation of financial impact

While there is evidence that Australian retailers are already experiencing the challenge of seasonal temperature variability, the impact is difficult to estimate, as variability in seasonal weather is difficult to predict. We understand that flow on effects could include a reduction in retail sales for our tenants, which could impact net property income for Vicinity. Our current approach is to continue to monitor these trends to understand the flow on financial impact to our business. With regards to consumers seeking sustainable products, this is an evolving trend that the entire retail industry is organically responding to and will only have an indirect impact on Vicinity's operations.

#### Management method

Our method for managing this risk is to continue to monitor consumer behaviours and retail sales throughout the year. Vicinity has a dedicated data and insights team that monitors consumer behaviours at our centres and conducts modelling and correlation analysis to understand variables that impact their purchasing behaviours. These insights then feed into Vicinity's intensive asset management approach, which focuses on driving foot traffic into our centres and helping consumers to better connect with retailers. Each asset has a dedicated marketing manager, supported by a national marketing team at the corporate office, to focus on strategies to increase customer attraction and retention.

#### Cost of management

9000000

#### Comment

\$9M in annual costs for internal resources - The cost of understanding and managing this risk is captured by our internal resources utilised to undertake analysis on consumer behaviours and trends, during extreme weather events, and marketing activities, and the upkeep of Vicinity's data platform.

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#### Identifier

Risk 7

#### Where in the value chain does the risk driver occur?

Direct operations

#### Risk type

Transition risk

#### Primary climate-related risk driver

Reputation: Increased stakeholder concern or negative stakeholder feedback

#### Type of financial impact driver

Reputation: Reduction in capital availability

#### Company- specific description

Management of reputational risk is becoming increasingly critical for Vicinity as external stakeholder focus on climate change issues increases. In Australia, there has been increased attention on the fiduciary duty of company Directors to consider climate-related risks in their business, as they are now considered 'foreseeable risks'. Several large global pension funds are using sustainability as a key criterion when selecting investments in real estate investment trusts (REITs) such as Vicinity,

especially when looking for long-term investments. Furthermore, with the release of the TCFD recommendations, investors are increasingly inquiring about how companies specifically manage material climate related impacts. A poor reputation in relation to sustainability and climate risk management can potentially lead to lack of investor confidence, put downward pressure on the share price and impact our access to capital as well as opportunities for investment. In addition, a poor reputation could also impact our standing as a partner of choice for our retailers, a destination of choice for our consumers, and an employer of choice for talented staff, potentially impacting our revenues and future growth.

**Time horizon**

Short-term

**Likelihood**

More likely than not

**Magnitude of impact**

Medium

**Potential financial impact**

**Explanation of financial impact**

Whilst our share price can be impacted from reputational damage, it is difficult to separate and quantify the impact of climate risk/events on the share price. Vicinity assesses reputational risks in terms of the severity of impact to our brand and negative publicity (both one-time and prolonged impact), and we measure our reputation through a number of non-financial metrics, such as investor surveys/engagement, tenant and customer surveys, employee engagement surveys as well as through changes to customer visitation and retail sales at our centres. Our approach is to proactively manage and be transparent about our approach to sustainability and management of climate risks in order to enhance our reputation amongst our key stakeholders.

**Management method**

We manage this risk by maintaining strong sustainability practices and being transparent with our stakeholders on our approach to Sustainability and management of climate risks. We demonstrate our sustainability leadership through actions such as our recent announcement to invest in 11MW of on-site solar (including the largest shopping centre solar project in Australia). We disclose our approach and achievements to the investment community using sustainability surveys such as DJSI (since 2004), GRESB (since 2009), CDP (since 2006) and FTSE4Good (since 2001). Vicinity has a dedicated Investor Relations team that holds regular meetings with investors (both domestic and international) and frequently communicates our approach to sustainability. We have also aligned our reporting with the TCFD recommendations to provide our investors detailed information about our approach to managing climate risks and opportunities. We additionally engage other external stakeholders including tenants, customers and suppliers by sharing information through face to face meetings and external communications on our sustainability website and annual report. Our most recent update on our sustainability approach and performance can be seen on our Sustainability website at <http://sustainability.vicinity.com.au>. We also engage our people in sustainability through our internal communications platform and measure their engagement with sustainability annually through our employee engagement survey.

**Cost of management**

1500000

**Comment**

\$1.5M in annual costs for reputation management - We protect and manage our reputational risk relating to climate resilience through Vicinity's sustainability and investor relations programs and staff resources. The above cost relates to undertaking our annual investor indices including GRESB, CDP, DJSI and other investor-based reporting, as well as the staff resources for Sustainability and Investor Relations teams.

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C2.4

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**(C2.4) Have you identified any climate-related opportunities with the potential to have a substantive financial or strategic impact on your business?**

Yes

C2.4a

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**(C2.4a) Provide details of opportunities identified with the potential to have a substantive financial or strategic impact on your business.**

**Identifier**

Opp1

### Where in the value chain does the opportunity occur?

Direct operations

### Opportunity type

Resource efficiency

### Primary climate-related opportunity driver

Move to more efficient buildings

### Type of financial impact driver

Other, please specify (Multiple impact drivers (see Comment))

*Multiple financial impact drivers - Reduced operating costs (e.g., through efficiency gains and cost reductions), Increased value of fixed assets (e.g., highly rated energy-efficient buildings), Benefits to workforce management and planning (e.g., improved health and safety, employee satisfaction resulting in lower costs)*

### Company- specific description

As a property owner and manager, Vicinity has considerable operating expenses relating to energy and water use, and waste management. Energy to run our centres represents a significant cost for the business, and is influenced by rising wholesale electricity prices in Australia, as well as costs to upgrade electricity networks nationally to ensure demand requirements are met in an environment of increasing average temperatures and therefore peak loads. Vicinity therefore has an opportunity to increase the environmental efficiency of our buildings by investing in energy efficiency, water efficiency and implementing programs to reduce waste sent to landfill. These initiatives can provide significant operational cost savings to our business and reduce our direct and indirect carbon emissions. Vicinity increases the environmental efficiency of our assets by investing in capital upgrades, asset refurbishments and larger scale developments, which all identify energy, water and waste management initiatives for implementation that can generate operational cost savings. We also use industry best practice rating schemes such as NABERS and Green Star Performance to benchmark and improve our buildings' efficiency and sustainability performance, which can also enhance the value of our assets. Improvement initiatives identified and implemented through these initiatives, such as maintaining better comfort levels, utilising natural light and increasing access to fresh air, can also lead to improved health and wellbeing outcomes for both Vicinity and tenants' employees and lead to increases in employee satisfaction, reduced absenteeism and turnover, and lower human resource costs. Additionally, these initiatives minimise the future cost of complying with impending regulatory changes, such updates to Section J of the National Construction Code (NCC), which will increase minimum requirements for energy efficiency in new buildings, and is likely to be regulated from late 2019 onwards.

### Time horizon

Short-term

### Likelihood

Very likely

### Magnitude of impact

Low

### Potential financial impact

10000000

### Explanation of financial impact

\$10M in avoided energy costs per year - Energy is a key operating expense for our portfolio, and energy costs are influenced by volatility of electricity markets and prices. Therefore, it is an important consideration in management's long-term financial planning. Initiatives to increase building environmental efficiency can generate significant operational cost savings. Our modelling estimates that future implementation of energy efficiency initiatives across our portfolio could reduce overall energy consumption by approximately 30%, resulting in avoided energy costs of about \$10M/year. In 2017, Vicinity invested \$4.5M in environmental efficiency initiatives, expected to generate approximately \$850,000 per year in avoided energy costs. Studies also show that buildings with high sustainability/energy ratings can have greater capital values and improve occupant wellbeing and productivity, however, it is challenging to quantify these benefits, particularly in retail property.

### Strategy to realize opportunity

To realise this opportunity, Vicinity has taken a long-term view on energy management and established an Integrated Energy Strategy, which includes a scaled-up energy efficiency program to deliver significant reductions in our long-term carbon emissions. Vicinity's annual budget and Strategic Asset Planning processes for each centre identifies initiatives for implementation through capital upgrades, such as more efficient HVAC systems, LED lighting upgrades, installation of more efficient water fixtures and fittings and programs to improve recycling rates. Our Environmental Improvement Program (EIP) additionally drives year on year efficiency across our assets through a systematic approach to measuring and monitoring performance and identifying improvement opportunities. The EIP informs centre specific initiatives for inclusion in Vicinity's annual budget planning and Strategic Asset Planning, and stipulates the completion of annual energy, water and waste audits and accredited NABERS and Green Star Performance assessments to assess asset performance, which help to identify further environmental efficiency improvement opportunities. Through our Sustainable Design Brief, Vicinity has integrated best

practice sustainability standards into the way we design and construct our new developments and asset refurbishment projects, including the identification of short, medium and long-term asset efficiency targets and initiatives to improve building environmental efficiency.

**Cost to realize opportunity**

5000000

**Comment**

\$5M in annual capital and operational costs - Through the Integrated Energy Strategy, Vicinity has invested approximately \$4.5M in energy efficiency projects (capital expenditure for retrofitting lighting to more efficient LED technology, optimising building control systems, and enhancing our HVAC systems to run more efficiently) and approximately \$450,000 in environmental efficiency initiatives (operational expenditure) in 2017. Annual costs to undertake building sustainability assessments and ratings, for example, NABERS and Green Star Performance, as well as costs associated with integrating energy efficiency and climate resilience requirements into the Sustainable Design Brief for new development projects are also included.

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**Identifier**

Opp2

**Where in the value chain does the opportunity occur?**

Direct operations

**Opportunity type**

Energy source

**Primary climate-related opportunity driver**

Use of lower-emission sources of energy

**Type of financial impact driver**

Other, please specify (Multiple impact drivers (see Comment))

*Multiple financial impact drivers - Reduced exposure to future fossil fuel price increases, Reduced operational costs (e.g., through use of lowest cost abatement), Returns on investment in low-emission technology, Reputational benefits resulting in increased demand for goods/services*

**Company- specific description**

Under current energy market policy, Australia has continued to experience increases in wholesale electricity prices and also price fluctuations during periods of peak demand. Given that the majority of Vicinity's electricity is sourced externally from the grid, these factors result in increasing energy costs for Vicinity. As grid electricity prices increase, the opportunity for Vicinity is that investment in onsite renewable energy becomes more commercially viable, enabling us to reduce our operational costs, providing strong returns on investment, and driving significant reductions in our carbon emissions - a key objective under the low carbon smart assets pillar of our sustainability strategy. In addition, shopping centres typically have extensive areas (such as roof tops and carparks) that can be utilised for on-site energy generation – this, combined with high levels of solar radiance across many parts of Australia further increases the appeal of solar installation on our asset portfolio. Generation of decentralised energy (such as solar) on site can additionally reduce our reliance on and exposure to the national electricity grid and associated fluctuations and increases in electricity prices. Furthermore, investment in lower emission sources of energy, such as solar, can result in positive reputational outcomes for Vicinity amongst our retail tenants and consumers, and increase demand for our services. In order to realise this opportunity, Vicinity has developed an Integrated Energy Strategy that includes a staged onsite renewable energy and scaled up energy efficiency program.

**Time horizon**

Short-term

**Likelihood**

Very likely

**Magnitude of impact**

Low

**Potential financial impact**

4000000

**Explanation of financial impact**

\$4M annual returns from solar - Vicinity's Integrated Energy Strategy includes roll out of an on-site renewable energy program. Stage 1 of this program includes onsite solar installations across five shopping centres, delivering an average IRR of 12%, which equates to approximately \$4M in the first year. Modelling conducted internally by Vicinity shows that further increases in electricity prices could make future investment in renewable energy and energy efficiency technologies even more commercially viable for Vicinity, providing more certainty to undertake such investments through shorter return on investments.

**Strategy to realize opportunity**

We ensure that our business is resilient to variability and increases in grid electricity prices by planning for the long term. In 2016, we completed modelling to understand decarbonisation pathways for Vicinity which included an assessment of the potential longer term impact to Vicinity of changes to the wholesale electricity market and resulting expected price fluctuations. The modelling found that establishing and implementing a program to significantly reduce our carbon emissions is commercially feasible, and would be even more attractive if legislative changes are established in favour of renewable energy. Vicinity has developed an Integrated Energy Strategy which details a long-term energy management approach for the business. The strategy includes onsite renewable energy and a scaled up energy efficiency program to avoid the potential impacts of electricity price increases, with the added benefit of lowering our asset portfolio's carbon emissions. Stage 1 of the onsite renewable energy program commenced in FY18 and now underway, includes solar installations at five centres across South Australia and Western Australia at a cost of \$28M. Stage 2 of the program will commence in FY19 and will include an investment of approximately \$50M.

**Cost to realize opportunity**

28000000

**Comment**

\$28M is the annual cost to realise this opportunity, which covers Stage 1 of our solar rollout, which will be implemented within one year.

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**Identifier**

Opp3

**Where in the value chain does the opportunity occur?**

Direct operations

**Opportunity type**

Resilience

**Primary climate-related opportunity driver**

Other

**Type of financial impact driver**

Increased reliability of supply chain and ability to operate under various conditions

*Primary climate related driver - Other - Opportunities related to the development of adaptive capacity to respond to climate change*

**Company- specific description**

Global scientific predictions show that the frequency and severity of tropical cyclones, hurricanes, storms and tidal surges are expected to increase due to rising global ocean temperatures. Some parts of Australia, such as Queensland and northern New South Wales, are particularly vulnerable to the impacts of both tropical and extra tropical cyclones, which have historically been shown to impact on the operating conditions for shopping centres in these areas. Such impacts could cause physical damage to buildings and disrupt our centre and tenant operations. However, the opportunity for Vicinity is in having strong and proactive mitigation practices in place relating to adaptation planning and risk management, which result in avoided operational and maintenance costs, capital costs and insurance premiums, and lead to enhanced physical and financial resilience, as well as improve our ability to trade under various climatic conditions.

**Time horizon**

Medium-term

**Likelihood**

Likely

**Magnitude of impact**

Medium-low

**Potential financial impact**

53000000

**Explanation of financial impact**

\$53M in net present value reduction over 10 years - Having strong adaptation and risk management practices at our assets builds resilience and allows us to realise avoided costs relating to preparing for, responding to and recovering from acute weather events. Financial impact of acute weather events to Vicinity was based on a theoretical assessment of potential impacts to our existing managed portfolio of 81 assets. Our management is currently, or has plans in place to proactively manage this impact. Understanding each asset's inherent level of risk through financial analysis and quantifying the avoided costs based on the current residual risk profile allows us to develop the business case to implement further resilience measures that reduce the potential financial impact to the assets. We will continue to investigate and refine our understanding of these impacts to our business, and as part of this work, challenge the assumptions made in our initial assessment.

### Strategy to realize opportunity

Vicinity continues to build our understanding of climate related opportunities and risks for our business and asset portfolio, including the resilience and adaptive capacity of our centres, and incorporates climate risk considerations into key business decision making processes to respond to these impacts. We completed a portfolio-wide high-level climate risk assessment based on Australian future climate change projections, which considered the impacts of extreme weather events to identify the related risk profile of each of our assets. We then developed a climate resilience checklist which we used to carry out detailed resilience assessments at 15 of our highest risk rated centres during 2018 to identify inherent risks and appropriate resilience measures. We have embedded climate risk considerations and adaptation/resilience measures into various group-wide key decision-making processes, including operations, new developments, asset tiering and strategic asset planning. Our Sustainable Design Brief guides the design and construction of all new development projects, which requires climate resilience plans to be developed for each project. Our strategic asset planning process integrates climate resilience initiatives into both annual and long-term asset budgeting cycles. We also negotiate competitive insurance premiums at a portfolio level, whilst maintaining an appropriately high level of cover for assets with high risk exposure.

### Cost to realize opportunity

95000

### Comment

\$95,000 annual cost to realise this opportunity includes annualised costs (over 3 years) relating to the implementation of Vicinity's climate risk assessment and resilience program, including external consulting and advisory fees, the cost of developing Vicinity's Sustainable Design Brief (which guides climate resilience, adaptation and mitigation measures for development projects), and the cost of developing a climate resilience plan for a new development project.

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### Identifier

Opp4

### Where in the value chain does the opportunity occur?

Direct operations

### Opportunity type

Resilience

### Primary climate-related opportunity driver

Other

### Type of financial impact driver

Increased reliability of supply chain and ability to operate under various conditions

*Primary climate-related driver - Other: Opportunities related to the development of adaptive capacity to respond to climate change*

### Company-specific description

Keeping our centres open for trade during temperature extremes (heat waves, extreme cold days) can result in a number of risks for our assets, such as excess demand on HVAC systems and increased associated energy costs. Under such circumstances, Vicinity has an opportunity to proactively manage the heat load on our centres (to reduce excess demand on our HVAC systems) and reduce our reliance on the electricity grid by implementing energy efficiency initiatives and rolling out onsite renewable energy generation (such as solar). This can additionally minimise our exposure to increased electricity costs relating to energy consumption and peak demand charges, and reduce the cost of energy for our retail tenants. Such measures increase the reliability of our electricity supply and promote the overall resilience of the asset.

### Time horizon

Medium-term

### Likelihood

Very likely

### Magnitude of impact

Medium

### Potential financial impact

190000000

### Explanation of financial impact

\$190M reduction in net present value of future profits over 10 years was estimated as the financial impact of chronic risks to Vicinity. This is based on a theoretical assessment of the potential impacts to our existing managed asset portfolio (81 assets), and management is currently, or has plans in place to proactively manage this impact. It relates to investing in HVAC equipment with greater capacity to meet heating and cooling needs during extreme hot/cold days and making improvements to the building façade and envelope to reduce energy consumption. These initiatives enable us to avoid peak electricity costs during days of high energy demand, reduce HVAC failures and costs of equipment maintenance/replacement, and back up

generation during power outages. We will continue to investigate and refine our understanding of the potential financial impacts to our business and will challenge the assumptions made in our initial assessment.

### Strategy to realize opportunity

We realise this opportunity by reducing external heat loads to reduce excess demand on our HVAC systems. Vicinity conducts regular audits and assessments to identify and manage potential opportunities with regards to HVAC capacity requirements and energy efficiency. These are built into the budgeting and planning cycles for each asset through our strategic asset planning process. This process identifies aging or failing HVAC equipment that needs upgrading to more reliable and efficient equipment. Furthermore, the design and construction of Vicinity's development projects are directed by our Sustainable Design Brief, which considers sustainable design elements and equipment selection to maximise financial outcomes and address foreseeable climate change risks (including extreme temperatures), including specification of more energy efficient HVAC units, identifying upgrades required to building fabric, as well as integration of solar and energy efficiency initiatives. Vicinity has additionally established an Integrated Energy Strategy, which takes a long term view on energy management and includes onsite renewable energy and a scaled up energy efficiency program to reduce our overall demand and reliance on the electricity grid. Stage 1 of this program commenced in FY18 and now underway, includes solar installations at five centres across South Australia and Western Australia, at a cost of \$28M. Stage 2 is planned for FY19 and will include investment of approximately \$50M.

### Cost to realize opportunity

48000000

### Comment

\$48M in annual cost – In terms of capital investment, Vicinity spends approximately \$15M per annum on upgrading our end-of-life HVAC equipment with more energy efficient ones that could withstand demand requirements during extreme temperatures. In 2017 we invested approximately \$4.5M in energy efficiency projects in terms of capital (such as lighting upgrades, building management system upgrades and retrofitting HVAC equipment), and approximately \$450,000 in energy management services (operational expenditure such as energy audits). We've also included Stage 1 of our onsite renewable energy program, which commenced in FY18 and includes an investment of \$28M in solar. Our costs additionally include the work completed to integrate energy efficiency and climate resilience measures into the Sustainable Design Brief for new development projects.

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### Identifier

Opp5

### Where in the value chain does the opportunity occur?

Customer

### Opportunity type

Resilience

### Primary climate-related opportunity driver

Other

### Type of financial impact driver

Increased revenue through new products and services related to ensuring resiliency

*Other - opportunities related to the development of adaptive capacity to respond to climate change*

### Company- specific description

Through our portfolio wide high-level climate risk assessment, we have assessed the exposure of our assets to future climate projections (including extreme temperatures) in Australia. As average mean temperatures are predicted to increase right across Australia, majority of our assets are vulnerable to this trend. Therefore, ensuring we have strong, resilient centres that can withstand shocks and stress relating to extreme weather events, whilst remaining open for trade for our consumers and tenants is an opportunity for Vicinity. For example, extreme temperatures can increase consumer foot traffic to our centres, as consumers tend to seek refuge from the outdoor heat at shopping centres. By ensuring our centres are resilient and can cope with extreme weather conditions whilst providing a safe and comfortable environment for our consumers, we have an opportunity to turn increases in foot traffic to our centres into retailer sales, and ultimately increase revenues for Vicinity. This requires building services (such as HVAC systems) at our centres to be sized appropriately to deal with current and future temperature changes, to ensure we can maintain an environment where consumers want to stay and deliver successful outcomes for our retailers and ultimately back to Vicinity.

### Time horizon

Medium-term

### Likelihood

Likely

### Magnitude of impact

Low

### Potential financial impact

10000000

### Explanation of financial impact

\$10M in revenues per year - Having resilient centres that can cope with extreme temperatures and provide a comfortable refuge for consumers could lead to increased customer visitation and spend at our centres. This could generate more income for Vicinity as the increase in consumer foot traffic could drive tenant demand for space and ability to pay rent. The financial opportunity outlined here is challenging to quantify and is based on qualitative information. However, by way of example, even a minor increase in Vicinity's overall NPI of 1% would result in an increase in over \$10M to our revenues. Vicinity management is aware of this potential impact and is currently, or has plans in place to proactively pursue this opportunity moving forward. We will continue to further investigate and refine our understanding of the potential financial impacts of climate change to our business, and as part of this work will challenge the assumptions made in our initial assessment.

### Strategy to realize opportunity

Vicinity's strategy is to lower the external heat load to reduce excess demand on our HVAC systems. We conduct regular audits and assessments to identify and manage potential opportunities with regards to HVAC capacity requirements and energy efficiency. These are built into the budgeting and planning cycles for each asset through our strategic asset planning process, which identifies aging or failing HVAC equipment that needs upgrading to more reliable and efficient equipment. Our Sustainable Design Brief guides the design and construction of Vicinity's development projects and considers sustainable design elements and equipment selection to maximise financial outcomes and address foreseeable climate change risks (including extreme temperatures). This includes specification of more energy efficient HVAC units, upgrades required to building fabric, and integration of solar and energy efficiency initiatives. Furthermore, Vicinity's internal data science team monitors trends in foot traffic against climate-related events for each asset to determine the correlation and materiality, and quantify the size of this opportunity. We also focus on strategies to increase consumer attraction and retention by providing an engaging customer experience and helping consumers to better connect with our retailers. We believe that by enhancing our assets' physical resilience, combined with appropriate marketing strategies, we can realise the full potential of this opportunity.

### Cost to realize opportunity

28000000

### Comment

\$28M in costs per year – The cost to realise this opportunity includes the annualised cost of our climate resilience program over 3 years (including our portfolio-wide high-level climate risk assessment), as well as capital investments to better manage heat load at our assets. Vicinity spends approximately \$15M per annum on upgrading our end of life HVAC equipment with new more efficient ones that could withstand demand requirements during extreme temperatures. In 2017, we also invested approximately \$4.5M on energy efficiency projects such as lighting upgrades, building management system upgrades and retrofitting HVAC equipment. Additionally, we have included the cost of marketing activities to ensure customer attraction and retention and support retailer sales.

## C2.5

### (C2.5) Describe where and how the identified risks and opportunities have impacted your business.

	Impact	Description
Products and services	Impacted	Vicinity's primary product/service is our retail assets, through which we lease retail space to tenants. We understand that both physical and transition climate-related risks and opportunities can impact on the demand for our retail space and our ability to provide an uninterrupted product/service to our retailers. Physical risks: Our assets and services can experience impacts from acute and chronic physical risks (such as cyclones, storms, heatwaves, strong winds, flooding hail damage and bushfires). Physical damage to our assets and disruptions to essential services (such as electricity, gas and water supply) can interrupt the operations of our centres and therefore our tenants, hence impacting on rental income for Vicinity. More on this can be seen in the 'Supply chain and/or value chain' section below. Transition risks: Extreme weather events can result in stakeholder concerns and possible reputational impacts, potentially reducing the demand for our buildings and services (from both our retail tenants and consumers). Additionally, market related risks such as changing energy prices can impact our operational costs and ancillary income revenue such as electricity on-selling and car parking income. Such risks can reduce profitability and demand for our ancillary products/services and result in a reduction in income for Vicinity. Market risks such as potential changes in consumer behaviours and retail trends related to climate change and sustainability more broadly are also relevant. These risks are explained in the "Supply chain and/or value chain" section below. Vicinity realises opportunities relating to the above physical and transition risks via proactive management. Physical risks are managed by enhancing the resilience of our asset portfolio and responding to increasing stakeholder expectations through transparent engagement and communication of our approach to climate resilience. Additionally, having a long-term approach to energy management and onsite renewable energy (through our Integrated Energy Strategy), and continuing to invest in our understanding of consumers and retailer operations and responding to their needs helps to mitigate market-related transition risks.

	Impact	Description
Supply chain and/or value chain	Impacted	Physical risks: We have already observed impacts relating to acute physical risks associated with extreme weather events such as cyclones and flooding on our value chain, in particular to our tenants and consumers. Past events have impacted our centres and therefore retailer operations, including through centre closures (resulting in our retailers not being able to trade), shortened trading hours, disruption to both Vicinity's and our retailers' supply chains and property damage. Extreme weather events have also impacted our consumers and local communities, having effected employment due to closure of shopping centres, or led to an increase in accidents, slips, trips and falls to the public. We also recognise that our centres often play a positive role in the community during extreme weather events, through their use as unofficial places of refuge during such occurrences, or in more extreme circumstances via their use as response hubs and central coordination points for post-disaster response efforts. For example, following Cyclone Debbie in 2017, the carpark at our Whitsundays Plaza centre (which experienced the full impact of the cyclone) was used by multiple first responders and recovery agencies to coordinate recovery efforts in the local community. Chronic events, such as increased frequency of extreme hot days, generally increase foot traffic at our centres as consumers seek refuge from the outside heat, providing a larger customer base for our retailers. Transition risks: Market risks related to our value chain, such as changing consumer behaviours/preferences and increased cost of inputs (e.g. energy prices) are also likely to have an impact on Vicinity's revenues. Changes in consumer behaviours in relation to variability in seasonal temperatures (for example, increased hot or cold days which could drive an increase in foot traffic to our centres), as well as changing consumer preferences including the rise of conscious consumerism, can impact on consumption patterns of the products and services offered by the retailers in our centres, affecting the retail sales of our tenants and rental income for Vicinity. In the supply chain, changes to input costs, such as energy prices, can also impact our operational costs, as well as the revenues we generate from ancillary income sources such as electricity on sell to our retail tenants.
Adaptation and mitigation activities	Impacted	Physical risks: Vicinity takes a portfolio and company-wide approach to the identification of and adaptation planning in response to climate-related physical risks (both acute and chronic). We have integrated climate related physical risks into our asset and enterprise risk registers, including appropriate mitigation and adaptation responses. This includes the development of adaptation plans for our highest risk rated assets. At an enterprise level, we have completed a review of our major business decision making processes to incorporate the appropriate consideration of climate risk across the business in a consistent manner. For example, adaptation and resilience measures have been integrated into our development projects and capital upgrades through establishment of a Sustainable Design Brief. Furthermore, physical risks are integrated into crisis and emergency plans (and associated response procedures for natural perils such as cyclones, floods and heatwaves), as well as our asset tiering and capital transactions processes. Transition risks: Assessment of market risks such as changes to input costs (for example, energy prices) has led us to establish an Integrated Energy Strategy, which includes a large scale on-site renewable energy and scaled up energy efficiency program that will reduce our exposure to the national electricity grid and associated fluctuations in energy prices and achieve notable reductions in our direct carbon emissions. We have also incorporated renewable energy and energy efficiency requirements into our development projects and capital upgrades through establishment of a Sustainable Design Brief.
Investment in R&D	Impacted	Transition risks: Identification of opportunities related to generation of onsite renewable energy has led us to establish an Integrated Energy Strategy, which includes a large scale onsite renewable energy and scaled up energy efficiency program. Vicinity recently announced Australia's largest ever shopping centre onsite solar investment, which includes a \$28 million investment in onsite solar installations at five centres in South Australia and Western Australia commenced during FY18 (Stage 1), and an additional \$50 million investment to commence in FY19 (Stage 2). This project will include Australia's largest onsite installation of solar carpark shade sails at four centres, and the largest shopping centre battery installation (500 kWh battery at Castle Plaza shopping centre in SA) to trial the latest energy storage technology and reduce our reliance on the grid. We are also undertaking feasibilities into investing in low emissions technology trials at selected assets, such as building materials with embedded solar generation (e.g. solar glass, bifacial PV panels and autonomous micro-generation smart lighting systems), solar air-conditioning systems and technologies to transition from gas heating, in order to identify potential opportunities for portfolio-wide adoption. Physical risks: In response to identified climate related physical risks, Vicinity is also investing in R&D, technologies and innovative management approaches that enhance asset resilience. These include technologies and solutions to reduce heat island effects (for example, creating light coloured building and pavement surfaces and increasing vegetation), designing stormwater infrastructure that accounts for future flood scenarios, and using drought proof, low fire risk native vegetation in centre landscaping.
Operations	Impacted	Physical risks: Vicinity's major review of business decision making processes revealed that over the previous 10-year period, more than 80% of Vicinity's assets have had an insurance claim related to a physical climate impact. Past events such as cyclones, storms and flooding have caused physical damage to the building fabric, car parks, plant equipment and HVAC systems, as well as resulted in limited physical access to centres and connectivity issues that have led to increased operational and maintenance costs. Chronic impacts, such as an increase in the number of extreme hot days, have also impacted operational costs as a result of higher demand on HVAC systems (increasing energy use) and utility losses (requiring the use of back-up generators). Transition risks: Assessment of market risks such as changes to input costs (for example, energy prices – energy costs being our largest operational expense) has led us to establish an Integrated Energy Strategy, which includes a large scale on-site renewable energy and scaled up energy efficiency program that will reduce our exposure to the national electricity grid and associated fluctuations in energy prices, and achieve notable reductions in our direct carbon emissions.
Other, please specify	Please select	

## C2.6

### (C2.6) Describe where and how the identified risks and opportunities have factored into your financial planning process.

	Relevance	Description
Revenues	Impacted	Vicinity's revenues are primarily derived via rental income from our retail tenants. We also derive ancillary income from on-selling of electricity to our retail tenants, car parking and mall media fees. Acute physical risks such as cyclones, storms and flooding can disrupt centre operations, impacting on consumer visitation and retailer trading, and result in loss of both rental and ancillary income for Vicinity. Conversely, chronic climate events, such as an increased number of extreme hot days, can lead to increased foot traffic at our centres, as consumers seek refuge from outside temperatures in our shopping centres. This can drive increased sales for our retailers, leading to higher revenue for Vicinity. Climate related impacts on revenue are considered in Vicinity's strategic asset planning process, which takes a risk based approach to integrating climate change adaptation and resilience measures into budget and capex planning for our centres.

	Relevance	Description
Operating costs	Impacted	Vicinity's annual budgeting process directly and indirectly factors in operating costs for managing acute and chronic physical risks at our assets, such as heavy rains, storms, cyclones, strong winds and extreme temperature days, to ensure that our centres are prepared to respond to such events. Costs associated with increases in energy loads and rates (for example, during peak times and as a result of general increases in wholesale electricity prices), maintenance and repair costs, as well as labour costs related to cleaning, security and customer service/tenant engagement requirements are accounted for in each asset's annual operating budget. Such cost impacts are considered as part of Vicinity's asset tiering/investment planning process (which assesses the long term investment potential and strategy for each asset) and the annual strategic asset planning process (which determines short, medium and long-term plans for each asset).
Capital expenditures / capital allocation	Impacted	Impacts related to both acute and chronic physical risks and transition risks (e.g. increase in energy prices) are factored into capital expenditure/allocation planning in a number of ways: 1) Annual strategic asset plans, which identify relevant physical resilience measures for implementation and related capital expenditure requirements for each asset; 2) Integrated Energy Strategy, which identifies capex requirements for implementation of on-site renewable energy and asset level energy efficiency initiatives; 3) Sustainable Design Brief, which identifies capex requirements for initiatives that build resilience to climate related physical impacts and reduce our carbon emissions, for implementation during development projects and major capital upgrades; 4) Enterprise and asset level risk registers, which identify climate risks and adaptation strategies; and 5) Planned and programmed maintenance works, the allocation process for which is currently being reviewed to ensure climate risks are considered in the prioritisation of plant and equipment upgrades.
Acquisitions and divestments	Impacted	Climate risks are considered in Vicinity's capital transactions process in a number of ways. During the due diligence process for asset acquisitions, historical insurance claims are reviewed to understand the impact of past climate related events to the asset (such as flooding and storms) and their corresponding insurance implications. Technical due diligence documentation is also reviewed in detail to identify any potential resilience issues associated with the asset being purchased. In addition, we use high level climate risk assessments of nearby Vicinity assets (where we have existing assets located in the same Australian climatic region) to understand potential climate risks for the asset being acquired and complete energy performance assessments against Vicinity's long term internal carbon targets to identify and quantify any adaptation and mitigation activities requiring implementation following asset purchase. Results of Vicinity's portfolio-wide high level climate risk assessment and resulting asset climate risk ratings have also been integrated into Vicinity's asset tiering process, which considers a range of risks and criteria in evaluating each asset's investment and development potential, and in reviewing potential acquisition opportunities.
Access to capital	Impacted	Vicinity defines key capitals in our 2018 Annual Integrated Report as Real Estate (manufactured capital), People (human capital), Capital (financial capital), Data and systems (intellectual capital) and brand (social capital). Climate-related risks and opportunities are factored into our planning for these capitals in direct and indirect ways. In relation to financial capital, as the investment community increases its focus and scrutiny on climate change risk, Vicinity will be increasingly expected to demonstrate our approach and communicate our response. Many large global pension funds are now using sustainability as a key criterion when selecting long-term investment opportunities in real estate investment trusts such as Vicinity. With the release of the TCFD Recommendations, investors now have a consistent framework through which to seek and assess information regarding companies' climate related risks and opportunities, and management strategies. Vicinity transparently communicates our approach to addressing climate related risks and opportunities through our annual sustainability reporting and by participating in investor surveys such as the CDP, DJSI and GRESB. Therefore, we anticipate that Vicinity's approach to climate change adaptation and mitigation and our realisation of business opportunities is well understood by the investment community and should improve our access to financial capital. We strengthen our brand (social capital) and relationships by maintaining a leading approach to sustainability (including climate change adaptation and mitigation), collaborating with our key stakeholders such as retailers, suppliers and strategic partners to achieve shared sustainability goals and proactively communicating our performance. In relation to our people (human capital), driving engagement with Vicinity's sustainability programs is a key lever for enhancing employee engagement, attraction and retention. We enhance our data and systems (intellectual capital) by systematically integrating climate risk and opportunity consideration into key decision-making processes such as risk management, emergency planning and asset tiering. Integration of climate risks and opportunities into real estate (manufactured capital, i.e. our assets) is explained in 'operating costs', 'capital expenditures/allocation' and 'assets' areas within this question.
Assets	Impacted	Impacts related to both acute and chronic physical risks and transition risks (e.g. increases in energy prices) are factored into our portfolio wide asset planning processes and are accounted for in Vicinity's operating costs, capital expenditure/allocation planning, and expected revenue generation. Vicinity's strategic asset planning (SAP) process considers a broad range of long term factors, including asset level climate risk and decarbonisation pathways and opportunities. Please refer to descriptions in 'Revenues', 'Operating costs' and 'Capital expenditures/capital allocation' areas above for more information.
Liabilities	Impacted	As a part of our debt facility reporting obligations, Vicinity reports to our debtor providers on our compliance with laws and regulations on request, which includes environmental compliance related topics. Vicinity's Environmental Management System (EMS) identifies, assesses and manages our environmental risks and impacts, including compliance with any environmental law or regulations, such as the National Greenhouse and Energy Reporting Act (2007). The EMS also governs how we proactively manage our energy use and carbon emissions.
Other	Please select	

## C3. Business Strategy

### C3.1

#### (C3.1) Are climate-related issues integrated into your business strategy?

Yes

#### C3.1a

**(C3.1a) Does your organization use climate-related scenario analysis to inform your business strategy?**

Yes, qualitative and quantitative

**C3.1c**

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**(C3.1c) Explain how climate-related issues are integrated into your business objectives and strategy.**

Climate change is integrated into Vicinity's Group level strategy through our Sustainability strategy – see: <http://sustainability.vicinity.com.au/our-business-and-strategy/#sustainability-strategy>. Two pillars of the Sustainability strategy – 'Climate Resilience' and 'Low Carbon Smart Assets' – focus specifically on climate change adaptation and mitigation respectively. Together with our Climate Policy, the Sustainability strategy informs the development of Vicinity's 1 to 5 year business objectives and initiatives.

Since 2016, our Sustainability strategy has informed a program of work to assess Vicinity's climate related risks and opportunities at an enterprise and asset level. Through extensive research and modelling, we have identified our exposure to physical risks (for example, from extreme weather events) for each asset in our portfolio, and have assessed the potential impact of climate related transition risks to our business, particularly related to our reliance on the electricity grid, changing electricity markets and opportunities to mitigate such risks through improving the energy efficiency of our assets and investing in onsite renewable energy, specifically solar (as described in section C2.2b). The results of our extensive research and modelling, including response measures to enhance asset resilience and mitigate our direct carbon impact have been integrated into Vicinity's major business processes (including operations, development and capital upgrade projects, asset tiering process, capital transactions investment/divestment, and risk management) and key performance metrics (through energy and carbon emissions reduction targets over the short, medium and long term) (as described in section C2.2d).

During the year, we have delivered a number of initiatives to further integrate climate change considerations into our business strategy, processes and objectives, including:

1. Development of climate resilience and adaptation plans for all priority assets (those with the highest climate related risk ratings based on our portfolio-wide high level climate risk assessment - 15 centres);
2. Integration of adaptation/resilience and carbon reduction/mitigation objectives into our strategic asset planning (SAP) process, which informs annual budgets and long term planning for each asset;
3. Integration of climate risks and opportunities into asset investment tiering process, which informs investment management decisions (e.g. capital investments, development potential and acquisition/divestment of assets);
4. Integration of climate adaptation/resilience and carbon reduction/mitigation objectives and measures into our development and asset refurbishment projects through establishment of a Sustainable Design Brief; and
5. Development of an Integrated Energy Strategy that includes an onsite renewable energy and scaled up energy efficiency program, and which will reduce our reliance on the national electricity grid (and related variability in energy costs) and achieve significant reductions in our carbon emissions.

**C3.1d**

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**(C3.1d) Provide details of your organization's use of climate-related scenario analysis.**

Climate-related scenarios	Details
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Climate-related scenarios	Details
Other, please specify (RCP4.5 and RCP8.5)	<p>Vicinity has completed scenario analysis to understand the potential financial impact of climate-related physical risks/opportunities on our business. • Boundaries and time horizons: Analysis covered all retail assets under our operational control (81 assets). The financial impact was modeled over a 10-year period to FY28. • Scenarios used: We used RCP 4.5 and 8.5 for this analysis, which consider an emissions trajectory based on outcomes that current global and Australian policy and targets would achieve (RCP 4.5) and a scenario of no real action towards mitigating climate change (RCP 8.5), to demonstrate a range of potential temperature increases and resulting impact on climate variables. There is no significant difference between the impacts resulting from the two scenarios to 2030 (modeled timeframe), but this difference increases significantly from 2050 onwards. • Inputs into the analysis included: 1) existing asset level climate related risk analyses (geographic and property details, historical events resulting in losses and insurance premiums paid); 2) results of portfolio-wide high-level climate risk assessment; 3) historical and future projected income and expenses for each centre; 4) forecasts on wholesale electricity prices; 5) asset discount and capitalisation rates; and 6) Five year capital budget plans. • Assumptions: Scenarios RCP 4.5 and RCP 8.5 were used to model chronic impacts. The acute shock scenario was based on the probability of occurrence of the largest historical event experienced within the portfolio to date (Cyclone Debbie in 2017 by Whitsunday Plaza, adjusted for differences in exposure and sensitivity to climate impacts for each centre). Assumptions were made with regards to the operational impact of extreme weather events to cashflows, cashflow sensitivity to operational impacts, future annual income growth, discount rates and capitalisation rates. • Analytical method included: 1) Initial mapping of climate risks to income and expenses; 2) an internal workshop to validate how extreme weather events impact revenue and cost items at an asset; 3) development of a financial model to estimate the impact of each extreme weather type on future cash flows for all assets under acute and chronic scenarios; and 4) sensitivity analysis of assumptions. • Results and outcomes: The study produced a financial model that estimates the reduction in net present value of future profits over a 10-year period under acute, chronic and combined scenarios. Under these scenarios we've identified assets that are likely to have higher (and lower) than average value reductions – those with higher value reductions typically include assets with the highest exposure to climate risks and the highest current value. • Use of results: Results of this study have been used to better understand the potential future financial impact of climate related risks across our asset portfolio, and will be integrated into Vicinity's strategic asset planning, investment tiering, capital transaction and development processes to assist decision making and prioritise adaptation and resilience strategies to manage identified risks. • Reporting: An overview of the scenario analysis has been communicated to Vicinity's Board Risk and Compliance Committee and relevant business units (such as Investment Management, Development and Capital Transactions) whose business processes the findings will be incorporated into. Results are provided externally through this CDP submission (CC2.3a and 2.4a) and publicly disclosed on our website: <a href="http://sustainability.vicinity.com.au">http://sustainability.vicinity.com.au</a>. • Changes to strategy and business model: As detailed in CC3.1c, management of climate change risks and opportunities are integrated into Vicinity's business strategy and major business processes through our Sustainability strategy. Results of the scenario analysis will also be integrated where relevant, to further strengthen decision making across the business.</p>

## C4. Targets and performance

### C4.1

#### (C4.1) Did you have an emissions target that was active in the reporting year?

Both absolute and intensity targets

#### C4.1a

#### (C4.1a) Provide details of your absolute emissions target(s) and progress made against those targets.

**Target reference number**

Abs 1

**Scope**

Scope 1+2 (location-based)

**% emissions in Scope**

100

**% reduction from base year**

6

**Base year**

2015

**Start year**

2015

**Base year emissions covered by target (metric tons CO2e)**

236526

**Target year**

2017

**Is this a science-based target?**

No, but we anticipate setting one in the next 2 years

**% achieved (emissions)**

100

**Target status**

Expired

**Please explain**

The emissions reduction target reported is for the current reporting period, using 2015 as a base year. Vicinity's carbon emissions reduction target of 6 per cent from 2015 was achieved and exceeded this year, as a result of energy reduction measures implemented across our centres through our Integrated Energy Strategy. Our actual reduction was 16%. We decreased our overall absolute emissions compared to 2015 by approximately 37,600 tonnes of CO<sub>2</sub>-e, but also decreased our total gross lettable area (GLA) over the same period due to divestment of a number of assets, which partially contributed to a decrease in absolute emissions. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate-wide target. Target setting is a key component of our approach to continuous environmental improvement and achieving the 'Low carbon smart assets' pillar of our Sustainability strategy. Vicinity sets annual performance targets to drive continuous improvement across our asset portfolio in key environmental metrics such as energy, carbon emissions, waste and water. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

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**Target reference number**

Abs 2

**Scope**

Scope 1+2 (location-based)

**% emissions in Scope**

100

**% reduction from base year**

9

**Base year**

2015

**Start year**

2015

**Base year emissions covered by target (metric tons CO<sub>2</sub>e)**

236526

**Target year**

2018

**Is this a science-based target?**

No, but we anticipate setting one in the next 2 years

**% achieved (emissions)**

0

**Target status**

Underway

**Please explain**

The emissions reduction target reported is for the 2018 reporting period, using 2015 as a base year. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate-wide target. As outlined above, this group level target was set through Vicinity's portfolio-wide approach to continuous environmental improvement which forms an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy. Such targets drive year on year improvements in our operational environmental performance metrics including energy, carbon emissions, water and waste. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. In addition, Vicinity's Integrated Energy Strategy (IES) includes an on-site renewable energy and scaled-up energy efficiency program that will help drive significant future reductions in our Scope 2 emissions. Stage 1 of the IES commenced during FY18 and includes a solar roll out across five centres in South Australia and Western Australia at a cost of \$28M. Stage 2 will commence in FY19 and will include an additional investment of \$50M. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>.

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## C4.1b

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(C4.1b) Provide details of your emissions intensity target(s) and progress made against those target(s).

**Target reference number**

Int 1

**Scope**

Scope 1+2 (location-based)

**% emissions in Scope**

100

**% reduction from baseline year**

6

**Metric**

Metric tons CO2e per square meter\*

**Base year**

2015

**Start year**

2015

**Normalized baseline year emissions covered by target (metric tons CO2e)**

0.08

**Target year**

2017

**Is this a science-based target?**

No, but we anticipate setting one in the next 2 years

**% achieved (emissions)**

100

**Target status**

Expired

**Please explain**

The emissions intensity reduction target reported is for the current reporting period, using 2015 as a base year. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate wide target. We achieved and exceeded our target of 6 per cent reduction in energy/emissions intensity from 2015. Our actual reduction was 12%. We decreased our overall absolute emissions compared to 2015 by approximately 37,600 tonnes of CO2-e, but also decreased our total gross lettable area (GLA) due to divestment of several assets. Target setting (both absolute and intensity) is a key component of our portfolio-wide approach to continuous environmental improvement and achieving the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy. We establish annual targets for key environmental metrics such as energy, carbon emissions, waste and water. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**% change anticipated in absolute Scope 1+2 emissions**

6

**% change anticipated in absolute Scope 3 emissions**

0

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**Target reference number**

Int 2

**Scope**

Scope 1+2 (location-based)

**% emissions in Scope**

100

**% reduction from baseline year**

**Metric**Metric tons CO<sub>2</sub>e per square meter\***Base year**

2015

**Start year**

2015

**Normalized baseline year emissions covered by target (metric tons CO<sub>2</sub>e)**

0.08

**Target year**

2018

**Is this a science-based target?**

No, but we anticipate setting one in the next 2 years

**% achieved (emissions)**

0

**Target status**

Underway

**Please explain**

The emissions intensity reduction target reported is for the 2018 reporting period, using 2015 as a base year. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate wide target. As outlined above, this group level target was set through Vicinity's portfolio-wide approach to continuous environmental improvement which forms an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy. Such targets drive year on year improvements in our operational environmental performance metrics including energy, carbon emissions, water and waste. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. In addition, Vicinity's Integrated Energy Strategy (IES) includes an on-site renewable energy and scaled-up energy efficiency program that will help drive significant future reductions in our Scope 2 emissions. Stage 1 of the IES commenced in FY18 and includes a solar roll out across five centres in South Australia and Western Australia at a cost of \$28M. Stage 2 will commence in FY19 and will include an additional investment of \$50M. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**% change anticipated in absolute Scope 1+2 emissions**

9

**% change anticipated in absolute Scope 3 emissions**

0

**C4.2****(C4.2) Provide details of other key climate-related targets not already reported in question C4.1/a/b.****Target**

Energy usage

**KPI – Metric numerator**

Energy consumption (Megajoules)

**KPI – Metric denominator (intensity targets only)**

N/A

**Base year**

2015

**Start year**

2015

**Target year**

2017

**KPI in baseline year**

1004909061

**KPI in target year**

944614518

**% achieved in reporting year**

100

**Target Status**

Expired

**Please explain**

Absolute energy reduction target reported is for the current reporting period, using 2015 as a base year. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate wide target. We achieved and exceeded our target of 6 per cent reduction in energy use from 2015 (with an actual reduction of 15%), as a result of energy efficiency initiatives implemented through our Integrated Energy Strategy. We decreased our overall absolute energy compared to 2015 by approximately 146,000 GJ. Target setting (both absolute and intensity) is a key component of our portfolio-wide approach to continuous environmental improvement and achieving the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy. We establish annual targets for key environmental metrics such as energy, carbon emissions, waste and water. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**Part of emissions target**

Abs 1, Abs 2, Int 1, Int 2

**Is this target part of an overarching initiative?**

No, it's not part of an overarching initiative

**Target**

Energy usage

**KPI – Metric numerator**

Energy consumption (Megajoules)

**KPI – Metric denominator (intensity targets only)**

N/A

**Base year**

2015

**Start year**

2015

**Target year**

2018

**KPI in baseline year**

1004909061

**KPI in target year**

914467246

**% achieved in reporting year**

0

**Target Status**

Underway

**Please explain**

The absolute energy reduction target reported is for the 2018 reporting period, using 2015 as a base year. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate-wide target. As outlined above, this group level target was set through Vicinity's portfolio-wide approach to continuous environmental improvement which forms an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy. Such targets drive year on year improvements in our operational environmental performance metrics including energy, carbon emissions, water and waste. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. In addition, Vicinity's Integrated Energy Strategy (IES) includes an on-site renewable energy and scaled-up energy efficiency program that will help drive significant future reductions in our Scope 2 emissions. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**Part of emissions target**

Abs 2, Int 2

**Is this target part of an overarching initiative?**

No, it's not part of an overarching initiative

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**Target**

Energy usage

**KPI – Metric numerator**

Energy consumption (Megajoules)

**KPI – Metric denominator (intensity targets only)**

Square meters of gross lettable area (GLA)

**Base year**

2015

**Start year**

2015

**Target year**

2017

**KPI in baseline year**

341

**KPI in target year**

321

**% achieved in reporting year**

100

**Target Status**

Expired

**Please explain**

Energy intensity reduction target reported is for the current reporting period, using 2015 as a base year. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate wide target. At the end of 2017, we achieved and exceeded our target of 6 per cent reduction in energy intensity from 2015 (with an actual reduction of 11%). We decreased our overall absolute energy compared to 2015 by approximately 150,000 GJ, but also decreased our total gross lettable area (GLA) due to divestment of a number of assets. Target setting (both absolute and intensity) is a key component of our portfolio-wide approach to continuous environmental improvement and achieving the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy. We establish annual targets for key environmental metrics such as energy, carbon emissions, waste and water. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**Part of emissions target**

Abs 1, Abs 2, Int 1, Int 2

**Is this target part of an overarching initiative?**

No, it's not part of an overarching initiative

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**Target**

Energy usage

**KPI – Metric numerator**

Energy consumption (Megajoules)

**KPI – Metric denominator (intensity targets only)**

Square meters of gross lettable area (GLA)

**Base year**

2015

**Start year**

2015

**Target year**

2018

**KPI in baseline year**

341

**KPI in target year**

310

**% achieved in reporting year**

0

**Target Status**

Underway

**Please explain**

The energy intensity reduction target reported is for the 2018 reporting period, using 2015 as a base year. The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate wide target. As outlined above, this group level target was set through Vicinity's portfolio-wide approach to continuous environmental improvement which forms an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy. Such targets drive year on year improvements in our operational environmental performance metrics including energy, carbon emissions, water and waste. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. In addition, Vicinity's Integrated Energy Strategy (IES) includes an on-site renewable energy and scaled-up energy efficiency program that will help drive significant future reductions in our Scope 2 emissions. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**Part of emissions target**

Abs 2, Int 2

**Is this target part of an overarching initiative?**

No, it's not part of an overarching initiative

**Target**

Renewable energy production

**KPI – Metric numerator**

Megawatts (MW) of solar

**KPI – Metric denominator (intensity targets only)**

N/A

**Base year**

2017

**Start year**

2018

**Target year**

2018

**KPI in baseline year**

0.17

**KPI in target year**

8

**% achieved in reporting year**

0

**Target Status**

Underway

**Please explain**

Renewable energy production target is reported for the 2018 reporting period, using 2017 as a base year. This is a portfolio-wide target, established as a part of Vicinity's Integrated Energy Strategy (IES), which includes an on-site renewable energy and scaled-up energy efficiency program. The IES will help achieve significant reductions in our carbon emissions and is fundamental to delivering the 'Low Carbon Smart Assets' pillar of Vicinity's Sustainability strategy. Stage 1 of the IES commenced in FY18 and will include an 11 MW solar roll out across five centres in South Australia and Western Australia, with 8 MW to be installed by the end of 2018.

**Part of emissions target**

Abs 2, Int 2

**Is this target part of an overarching initiative?**

No, it's not part of an overarching initiative

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**Target**

Waste

**KPI – Metric numerator**

Recycling rate - % of total waste diverted from landfill

**KPI – Metric denominator (intensity targets only)**

N/A

**Base year**

2016

**Start year**

2017

**Target year**

2017

**KPI in baseline year**

30

**KPI in target year**

39

**% achieved in reporting year**

100

**Target Status**

Expired

**Please explain**

Recycling rate is reported for the 2017 reporting period, with annual targets set that represent an improvement when compared to the previous reporting year's performance (2016). The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate wide target. Vicinity sets waste targets based on our overall diversion from landfill (or recycling rate) as a proportion of the total waste generated, rather than having volume-based waste reduction targets. This is because we have very little direct control over the volume of waste that is generated at our centres, as it is largely produced by our retail tenants and consumers. The volume of waste generated also increases as business activity at our centres increases. However, Vicinity has direct control over the recycling facilities available at our centres and the education programs available to our retailers on appropriate disposal of waste, and as such has set targets in line with our operational control and relating to the proportion of waste diverted from landfill / recycled. In 2017, we achieved an average diversion rate of 39% (excluding waste to energy) through source separation recovery and recycling. This has reduced our total waste disposed as a proportion of total waste generated. We set annual recycling targets as a key component of our portfolio-wide approach to continuous environmental improvement and achieving the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy. Under this program, we have developed waste management plans for each asset to drive continuous improvement throughout the business. We publicly disclose our landfill diversion / recycling targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**Part of emissions target**

N/A

**Is this target part of an overarching initiative?**

No, it's not part of an overarching initiative

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**Target**

Waste

**KPI – Metric numerator**

Recycling rate - % of total waste diverted from landfill

**KPI – Metric denominator (intensity targets only)**

N/A

**Base year**

2017

**Start year**

2018

**Target year**

2018

**KPI in baseline year**

39

**KPI in target year**

43

**% achieved in reporting year**

0

**Target Status**

Underway

**Please explain**

Recycling rate is reported for the 2018 reporting period, with annual targets set that represent an improvement when compared to the previous reporting year's performance (2017). The methodology for establishing this target included the use of asset specific targets from across the portfolio and aggregating them to form a corporate wide target. An increase in the recycling rate results in less waste disposed to landfill, reducing Vicinity's Scope 3 emissions. Our waste targets are a key component of our portfolio-wide approach to continuous environmental improvement and achieving the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy. We establish annual targets for key environmental metrics such as energy, carbon emissions, waste and water. Annual energy and emissions reduction targets are informed by Vicinity's long-term internal carbon reduction target. We publicly disclose our annual energy and carbon reduction targets here: <http://sustainability.vicinity.com.au/our-business-and-strategy/our-commitments/learn-more/>

**Part of emissions target**

N/A

**Is this target part of an overarching initiative?**

No, it's not part of an overarching initiative

**C4.3**

**(C4.3) Did you have emissions reduction initiatives that were active within the reporting year? Note that this can include those in the planning and/or implementation phases.**

Yes

**C4.3a**

**(C4.3a) Identify the total number of projects at each stage of development, and for those in the implementation stages, the estimated CO2e savings.**

	Number of projects	Total estimated annual CO2e savings in metric tonnes CO2e (only for rows marked *)
Under investigation	181	37389
To be implemented*	19	2526
Implementation commenced*	0	0
Implemented*	312	6927
Not to be implemented	7	320

**C4.3b**

**(C4.3b) Provide details on the initiatives implemented in the reporting year in the table below.**

**Activity type**

Energy efficiency: Building services

**Description of activity**

Lighting

**Estimated annual CO2e savings (metric tonnes CO2e)**

3930

**Scope**

Scope 1

Scope 2 (location-based)

Scope 3

**Voluntary/Mandatory**

Voluntary

**Annual monetary savings (unit currency – as specified in CC0.4)**

730000

**Investment required (unit currency – as specified in CC0.4)**

5000000

**Payback period**

4 - 10 years

**Estimated lifetime of the initiative**

6-10 years

**Comment**

Retrofitting lighting: LED lighting upgrades were implemented via 49 projects across 34 centres in 2017 as part of a national program roll out across our asset portfolio. In addition to significant energy savings, the LED technology also reduces lamp replacement costs and maintenance due to the long life time of LED lamps.

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**Activity type**

Energy efficiency: Building services

**Description of activity**

HVAC

**Estimated annual CO2e savings (metric tonnes CO2e)**

1490

**Scope**

Scope 1

Scope 2 (location-based)

Scope 3

**Voluntary/Mandatory**

Voluntary

**Annual monetary savings (unit currency – as specified in CC0.4)**

260000

**Investment required (unit currency – as specified in CC0.4)**

3600000

**Payback period**

11-15 years

**Estimated lifetime of the initiative**

16-20 years

**Comment**

Energy efficient HVAC equipment: Improving building service efficiency by retrofitting existing HVAC infrastructure. We conducted 40 projects across 36 assets, including installation of Variable Speed Drives (VSDs), upgrades to ventilation systems, and replacing existing HVAC systems with new, high efficient units.

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**Activity type**

Energy efficiency: Building services

**Description of activity**

Building controls

**Estimated annual CO2e savings (metric tonnes CO2e)**

994

**Scope**

Scope 1  
 Scope 2 (location-based)  
 Scope 3

**Voluntary/Mandatory**

Please select

**Annual monetary savings (unit currency – as specified in CC0.4)**

200000

**Investment required (unit currency – as specified in CC0.4)**

270000

**Payback period**

1-3 years

**Estimated lifetime of the initiative**

3-5 years

**Comment**

Building Management Systems and Controls: Includes upgrading our building management systems and implementation of building management analytical services and optimisation systems. Vicinity implemented these kinds of projects at 8 centres in 2017.

**Activity type**

Low-carbon energy installation

**Description of activity**

Solar PV

**Estimated annual CO2e savings (metric tonnes CO2e)**

65

**Scope**

Scope 1  
 Scope 2 (location-based)  
 Scope 3

**Voluntary/Mandatory**

Voluntary

**Annual monetary savings (unit currency – as specified in CC0.4)**

25000

**Investment required (unit currency – as specified in CC0.4)**

140000

**Payback period**

4 - 10 years

**Estimated lifetime of the initiative**

16-20 years

**Comment**

As a pilot prior to the commencement of our onsite Solar rollout program, we installed a 100 KW Solar PV system on Ellenbrook Central in WA, completed in April 2017, which has generated approximately 90,000 kwh of electricity in 2017.

## C4.3c

**(C4.3c) What methods do you use to drive investment in emissions reduction activities?**

Method	Comment
--------	---------

Method	Comment
Employee engagement	Energy and waste reduction targets. Each year operational energy, carbon and waste reduction targets are set for each asset. The targets are set in collaboration with asset operations teams and performance against them is monitored throughout the year to track progress in meeting the target. Such targets are additionally reflected in operations managers' performance scorecards, which are linked to individual performance incentive payments. Vicinity also promotes sustainability awareness among staff, and promotes behavioural changes that reduce energy use and waste to landfill, and resulting carbon emissions at our assets and corporate offices.
Compliance with regulatory requirements/standards	Energy Efficiency Opportunities Act (EEO). Vicinity complies with the Australian Government's EEO legislation via a program of assessment and public reporting of energy efficiency opportunities available within our asset portfolio. Vicinity's Environment Improvement Program (EIP) is an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy. It is implemented right across our asset portfolio and satisfies all EEO obligations. Whilst the EEO legislation has been repealed, the EEO framework is still in use at Vicinity via our EIP to drive emissions reduction activities.
Internal incentives/recognition programs	Energy, carbon and waste reduction targets. As part of Vicinity's Environment Improvement Program (an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy), we set asset specific environmental targets annually and roll out multi-site programs to drive improvements in energy and waste performance, and reduce associated carbon emissions. Asset specific targets inform site level operations managers' performance scorecards, which are linked to individual performance incentive payments. Furthermore, individual asset targets are aggregated to form a corporate, portfolio wide target, which informs individual performance scorecards (linked to performance incentive payments) of management teams. In addition, achievements in reducing our energy and carbon emissions are communicated to staff through the company's intranet and internal communication platform - The Loop.
Financial optimization calculations	Energy and waste management plans. Vicinity's Environment Improvement Program forms an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy and includes the development and implementation of asset specific energy and waste management plans. Plans are reviewed and updated annually for each asset and include a list of prioritised initiatives (which have undergone cost benefit analysis) to drive improvements in energy efficiency as well as increase recycling rates. Plans are additionally used to track asset progress in implementing planned initiatives at each asset over the course of each year.
Dedicated budget for other emissions reduction activities	Installation of renewable energy. Vicinity has recently established an Integrated Energy Strategy (IES), which includes an onsite renewable energy and scaled-up energy efficiency program for our asset portfolio. Stage 1 of this program commenced in FY18 and currently underway includes a \$28 million solar roll out across five centres in South Australia and Western Australia, representing Australia's largest shopping centre solar roll out to date. Stage 2 will commence in FY19 and will include approximately a \$50M investment. The IES will help drive significant reductions in our carbon emissions and is a key contributor to the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy.

## C4.5

**(C4.5) Do you classify any of your existing goods and/or services as low-carbon products or do they enable a third party to avoid GHG emissions?**

Yes

## C4.5a

**(C4.5a) Provide details of your products and/or services that you classify as low-carbon products or that enable a third party to avoid GHG emissions.**

### Level of aggregation

Company-wide

### Description of product/Group of products

The energy efficiency of our assets and installation of on-site solar directly enables Scope 1, 2 and 3 emissions to be avoided by third parties, including retail tenants in our buildings. The implementation of energy efficiency initiatives can deliver significant carbon emission reductions across whole of building performance. Through our Environment Improvement Program, Vicinity has implemented numerous technologies across the asset portfolio to increase our energy efficiency, such as energy-efficient HVAC, the use of low energy lighting (e.g. LEDs) and optimisation of building management systems. We have additionally implemented energy efficiency and low carbon features in major building upgrades and developments via our Sustainable Design Brief. Our Integrated Energy Strategy also includes the installation of on-site solar across selected assets and a scaled-up energy efficiency program which will further reduce whole building carbon emissions. These programs all form an important part of the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy.

### Are these low-carbon product(s) or do they enable avoided emissions?

Avoided emissions

### Taxonomy, project or methodology used to classify product(s) as low-carbon or to calculate avoided emissions

Other, please specify (Australia NGA Factors July 2017)

*Other: National Australia Greenhouse Accounts Factors (NGA) July 2017*

### % revenue from low carbon product(s) in the reporting year

### Comment

Vicinity's primary product/service is to provide leasing space in our centres to retailers. As we increase the energy efficiency of our assets, our retail tenants and consumers are able to avoid carbon emissions associated with using our centres. In the case of our retail tenants, such carbon emission reductions are shared by both owner and tenant, particularly in the case of centrally serviced lettable area (e.g. the provision of HVAC services), where energy efficiencies and resulting carbon reductions are also enjoyed by retailers leasing space in our centres.

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## C5. Emissions methodology

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### C5.1

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**(C5.1) Provide your base year and base year emissions (Scopes 1 and 2).**

#### Scope 1

**Base year start**

January 1 2015

**Base year end**

December 31 2015

**Base year emissions (metric tons CO2e)**

10080

**Comment**

#### Scope 2 (location-based)

**Base year start**

January 1 2015

**Base year end**

December 31 2015

**Base year emissions (metric tons CO2e)**

226446

**Comment**

#### Scope 2 (market-based)

**Base year start**

**Base year end**

**Base year emissions (metric tons CO2e)**

**Comment**

### C5.2

---

**(C5.2) Select the name of the standard, protocol, or methodology you have used to collect activity data and calculate Scope 1 and Scope 2 emissions.**

Australia - National Greenhouse and Energy Reporting Act

Defra Voluntary 2017 Reporting Guidelines

ISO 14064-1

The Greenhouse Gas Protocol: A Corporate Accounting and Reporting Standard (Revised Edition)

Other, please specify (Multiple - see 5.2a below)

### C5.2a

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**(C5.2a) Provide details of the standard, protocol, or methodology you have used to collect activity data and calculate Scope 1 and Scope 2 emissions.**

- Australia: National Greenhouse Accounts – July 2013
- Australia: National Greenhouse Accounts – July 2014
- Australia: National Greenhouse Accounts – August 2015
- Australia: National Greenhouse Accounts – August 2016
- Australia: National Greenhouse Accounts – July 2017
- [National Greenhouse and Energy Reporting \(Measurement\) Amendment \(Energy\) Determination 2017](#) July 2017
- National Greenhouse and Energy Reporting (Measurement) Determination 2008 Latest July 2016
- National Greenhouse and Energy Reporting (Measurement) Determination 2008 July 2015
- National Greenhouse and Energy Reporting (Measurement) Determination 2008 July 2014
- National Greenhouse and Energy Reporting (Measurement) Determination 2008 July 2013
- National Greenhouse and Energy Reporting (Measurement) Determination 2008 July 2012

## C6. Emissions data

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### C6.1

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**(C6.1) What were your organization's gross global Scope 1 emissions in metric tons CO2e?**

**Row 1**

**Gross global Scope 1 emissions (metric tons CO2e)**

4935

**End-year of reporting period**

<Not Applicable>

**Comment**

Vicinity's Scope 1 emissions from our asset portfolio relate mainly to natural gas combustion for heating, fugitive emissions from refrigerants and diesel consumption for back-up emergency generators. Overall, our scope 1 emissions make up approximately 5% of our total scope 1 and 2 greenhouse gas emissions.

**Row 2**

**Gross global Scope 1 emissions (metric tons CO2e)**

<Not Applicable>

**End-year of reporting period**

<Not Applicable>

**Comment**

<Not Applicable>

**Row 3**

**Gross global Scope 1 emissions (metric tons CO2e)**

<Not Applicable>

**End-year of reporting period**

<Not Applicable>

**Comment**

<Not Applicable>

**Row 4**

**Gross global Scope 1 emissions (metric tons CO2e)**

<Not Applicable>

**End-year of reporting period**

<Not Applicable>

**Comment**

<Not Applicable>

## C6.2

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### (C6.2) Describe your organization's approach to reporting Scope 2 emissions.

#### Row 1

##### Scope 2, location-based

We are reporting a Scope 2, location-based figure

##### Scope 2, market-based

Please select

##### Comment

Vicinity's scope 2 emissions from our asset portfolio result from electricity consumption, mainly sourced from the national electricity grid. The emissions factors used to calculate our scope 2 emissions are state-based as reported in the National Greenhouse Accounts factors workbook produced by the Australian Government.

## C6.3

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### (C6.3) What were your organization's gross global Scope 2 emissions in metric tons CO2e?

#### Row 1

##### Scope 2, location-based

193917

##### Scope 2, market-based (if applicable)

<Not Applicable>

##### End-year of reporting period

<Not Applicable>

##### Comment

Vicinity's scope 2 emissions from our asset portfolio result from electricity consumption, mainly sourced from the electricity grid. Electricity is used by heating, ventilation and air-conditioning (HVAC) systems, lighting, vertical transport and other minor general equipment. The emissions factors used to calculate our scope 2 emissions are state-based as reported in the National Greenhouse Accounts factors workbook produced by the Australian Government.

#### Row 2

##### Scope 2, location-based

<Not Applicable>

##### Scope 2, market-based (if applicable)

<Not Applicable>

##### End-year of reporting period

<Not Applicable>

##### Comment

<Not Applicable>

#### Row 3

##### Scope 2, location-based

<Not Applicable>

##### Scope 2, market-based (if applicable)

<Not Applicable>

##### End-year of reporting period

<Not Applicable>

##### Comment

<Not Applicable>

#### Row 4

**Scope 2, location-based**

<Not Applicable>

**Scope 2, market-based (if applicable)**

<Not Applicable>

**End-year of reporting period**

<Not Applicable>

**Comment**

<Not Applicable>

**C6.4**

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**(C6.4) Are there any sources (e.g. facilities, specific GHGs, activities, geographies, etc.) of Scope 1 and Scope 2 emissions that are within your selected reporting boundary which are not included in your disclosure?**

No

**C6.5**

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**(C6.5) Account for your organization's Scope 3 emissions, disclosing and explaining any exclusions.**

**Purchased goods and services****Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. Emissions related to our contractors and suppliers do not fall within our operational control, therefore we do not consider them to be relevant or applicable and do not collect or report data on their associated emissions.

**Capital goods****Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. Over the life of our retail assets the embodied emissions are immaterial compared to operational emissions captured as scope 1 and 2 and we therefore do not consider them to be relevant or applicable and do not collect or report associated data.

**Fuel-and-energy-related activities (not included in Scope 1 or 2)****Evaluation status**

Relevant, calculated

**Metric tonnes CO2e**

23853

### **Emissions calculation methodology**

These emissions relate to indirect emissions associated with our scope 1 and 2 emissions – that is, those from the extraction, production and transportation of fuels (including for electricity production) and electricity losses in the transmission and distribution network. For each fuel type, emissions have been calculated by multiplying the total quantity of fuel/electricity consumed by the relevant emissions factor from the Australian National Greenhouse Accounts (NGA) Factors. A list of the relevant emissions factors are supplied in question C8.2d.

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

100

### **Explanation**

Scope 3 emissions are calculated using fuel and energy consumption information documented on supplier invoices. Where there are gaps in invoice data, estimates are used. Reductions achieved in energy and electricity use in 2017 have resulted in related Scope 3 emissions also reducing over this period.

### **Upstream transportation and distribution**

#### **Evaluation status**

Not relevant, explanation provided

#### **Metric tonnes CO2e**

0

### **Emissions calculation methodology**

Not applicable

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

### **Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. As such, our business has minimal upstream transportation and distribution activities related to its operation.

### **Waste generated in operations**

#### **Evaluation status**

Relevant, calculated

#### **Metric tonnes CO2e**

41616

### **Emissions calculation methodology**

100% of Vicinity's total operational waste (as a proportion of our total GLA) has been captured and reported. The collection of solid waste for disposal to landfill results in indirect emissions, which have been calculated by multiplying the total quantity of waste sent to landfill by the relevant emissions factor within the Australian National Greenhouse Accounts (NGA) Factors, August 2015, August 2016 and July 2017. A list of the relevant emissions factors are supplied in question C8.2d.

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

100

### **Explanation**

Waste volumes used to calculate associated Scope 3 emissions are obtained from reports provided by our appointed waste consultant, who collects this information from invoices provided by our waste service providers. We have a program in place to improve recycling rates and reuse and reduce the amount of waste being sent to landfill at our centres. We increased recycling rates by 9% from 2016 to 2017, and reduced associated scope 3 emissions by almost 3,500 tonnes.

### **Business travel**

#### **Evaluation status**

Relevant, calculated

#### **Metric tonnes CO2e**

1995

### **Emissions calculation methodology**

These emissions relate to Vicinity employee air travel undertaken for business purposes. Emissions have been calculated using our flight data (sourced from our Business Travel Service Provider) and applying the DEFRA Methodology for calculating air travel emissions and set of conversion factors.

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

100

### **Explanation**

The geographical distribution of Vicinity's assets and state based offices mean that our employees are required to undertake travel to effectively operate our business. The associated Scope 3 emissions are material enough to warrant a program for reducing scope 3 emissions from our business air travel. To this end, Vicinity has installed the latest video conferencing technology at our corporate and state based offices around Australia to enable more effective communication across our employee base, limiting the need for travel between locations.

#### **Employee commuting**

##### **Evaluation status**

Not relevant, explanation provided

##### **Metric tonnes CO2e**

0

##### **Emissions calculation methodology**

Not applicable

##### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

##### **Explanation**

Due to the nature of our business, Vicinity has employee work locations spread across more than 80 centres and four corporate offices around Australia, making accurate calculation of this metric complicated. Furthermore, there is a current lack of robust data collection and calculation methods in Australia for this metric, and as such, a standard methodology for calculating employee commuting has not been developed for calculating this source of emissions. We will continue to investigate the potential to develop a methodology for calculating this data, but at this point in time estimate that it does not have a material impact on our total greenhouse gas emissions.

#### **Upstream leased assets**

##### **Evaluation status**

Not relevant, explanation provided

##### **Metric tonnes CO2e**

0

##### **Emissions calculation methodology**

Not applicable

##### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

##### **Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. Vicinity typically operates within assets that we own and manage, and such activities are captured in our Scope 1 and 2 emissions.

#### **Downstream transportation and distribution**

##### **Evaluation status**

Not relevant, explanation provided

##### **Metric tonnes CO2e**

0

##### **Emissions calculation methodology**

Not applicable

##### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

##### **Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. Vicinity is not involved in any downstream transportation and distribution activities, hence this metric is not relevant.

#### **Processing of sold products**

##### **Evaluation status**

Not relevant, explanation provided

##### **Metric tonnes CO2e**

0

##### **Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. Vicinity is not involved in processing of any sold products, hence this metric is not relevant.

**Use of sold products**

**Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. The use of sold products falls outside of our operational control, and is therefore not relevant to our emissions profile as per Australian greenhouse gas reporting regulations. However, as a responsible property owner and manager we encourage our retail tenants to minimise their energy use by providing regular energy use data for each tenancy (for those who purchase energy from our embedded networks) as well as guidance on ways to increase the energy efficiency of tenancy fit outs through our retail design guidelines.

**End of life treatment of sold products**

**Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. Vicinity is not involved in end-of-life treatment of any sold products, hence this metric is not relevant.

**Downstream leased assets**

**Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Emissions produced by retail tenants who lease space in our assets is outside of Vicinity's operational control, as we are responsible for and can therefore implement initiatives to improve energy efficiency relating to operation of base building and common mall areas only (for which emissions are captured in Scope 1 and 2). However, as a responsible property owner and manager we encourage our retail tenants to minimise their energy use by providing regular energy use data for each tenancy (for those who purchase energy from our embedded networks) as well as guidance on ways to increase the energy efficiency of tenancy fit outs through our retail design guidelines.

**Franchises**

**Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property. Vicinity does not own any franchises, hence this metric is not relevant.

**Investments****Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property, hence this metric is not considered relevant.

**Other (upstream)****Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property, hence this metric is not considered relevant.

**Other (downstream)****Evaluation status**

Not relevant, explanation provided

**Metric tonnes CO2e**

0

**Emissions calculation methodology**

Not applicable

**Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

**Explanation**

Vicinity's primary business activities relate to the investment and operation of retail property, hence this metric is not considered relevant.

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**(C6.7) Are carbon dioxide emissions from biologically sequestered carbon relevant to your organization?**

No

**C6.10**

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**(C6.10) Describe your gross global combined Scope 1 and 2 emissions for the reporting year in metric tons CO2e per unit currency total revenue and provide any additional intensity metrics that are appropriate to your business operations.**

**Intensity figure**

0.07

**Metric numerator (Gross global combined Scope 1 and 2 emissions)**

198852

**Metric denominator**

square meter

**Metric denominator: Unit total**

2824963

**Scope 2 figure used**

Location-based

**% change from previous year**

2

**Direction of change**

Decreased

**Reason for change**

Vicinity uses the intensity (normalised) metric of scope 1 and 2 emissions per square meter of gross lettable area (GLA) as our primary indicator of emissions performance. We set targets against this indicator. In 2017 Vicinity reduced our total scope 1 and 2 emissions by 13,500 tonnes of CO2e, but also reduced our GLA over this same period (though asset divestments). Our overall reduction in emissions intensity during 2017 was 2%.

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**Intensity figure**

0.000208

**Metric numerator (Gross global combined Scope 1 and 2 emissions)**

198852

**Metric denominator**

unit total revenue

**Metric denominator: Unit total**

956700000

**Scope 2 figure used**

Location-based

**% change from previous year**

1

**Direction of change**

Decreased

**Reason for change**

We have reduced our total scope 1 and 2 emissions and have also increased our revenue, which has improved our revenue-based indicator by 1%.

---

**Intensity figure**

174.4

**Metric numerator (Gross global combined Scope 1 and 2 emissions)**

198852

**Metric denominator**

full time equivalent (FTE) employee

**Metric denominator: Unit total**

1140

**Scope 2 figure used**

Location-based

**% change from previous year**

0.4

**Direction of change**

Decreased

**Reason for change**

Vicinity's primary business activities relate to the investment and operation of retail property, and Scope 1 and 2 emissions per FTE is therefore not considered a relevant indicator for our organisations emissions performance. However, we have reported on this indicator in other investor facing surveys, and in 2017, reduced both total FTEs in our business and our emissions, resulting in a 0.4% reduction in intensity for this metric.

## C7. Emissions breakdowns

### C7.1

**(C7.1) Does your organization have greenhouse gas emissions other than carbon dioxide?**

Yes

### C7.1a

**(C7.1a) Break down your total gross global Scope 1 emissions by greenhouse gas type and provide the source of each used greenhouse warming potential (GWP).**

Greenhouse gas	Scope 1 emissions (metric tons of CO2e)	GWP Reference
CO2	4183	IPCC Fourth Assessment Report (AR4 - 100 year)
CH4	8	IPCC Fourth Assessment Report (AR4 - 100 year)
N2O	3	IPCC Fourth Assessment Report (AR4 - 100 year)
HFCs	741	IPCC Fourth Assessment Report (AR4 - 100 year)

### C7.2

**(C7.2) Break down your total gross global Scope 1 emissions by country/region.**

Country/Region	Scope 1 emissions (metric tons CO2e)
Australia	4935

### C7.3

**(C7.3) Indicate which gross global Scope 1 emissions breakdowns you are able to provide.**

By facility

By activity

## C7.3b

### (C7.3b) Break down your total gross global Scope 1 emissions by business facility.

Facility	Scope 1 emissions (metric tons CO2e)	Latitude	Longitude
Altona Gate, Victoria, Australia	71	-37.83	144.85
Armidale Central, New South Wales, Australia	0	-30.51	151.66
Bankstown Central, New South Wales, Australia	0	-33.92	151.04
Bathurst City Centre, New South Wales, Australia	0	-33.42	149.58
Bayside, Victoria, Australia	175	-38.14	145.13
Belmont Village, Victoria, Australia	0	-38.17	144.35
Bentons Square, Victoria, Australia	0	-38.24	145.05
Box Hill Central (North Precinct), Victoria, Australia	25	-37.82	145.12
Box Hill Central (South Precinct), Victoria, Australia	399	-37.82	145.12
Brandon Park, Victoria, Australia	155	-37.91	145.16
Broadmeadows Central, Victoria, Australia	0	-37.68	144.92
Buranda Village, Queensland, Australia	0	-27.5	153.04
Carlingford Court, New South Wales, Australia	0	-33.78	151.05
Castle Plaza, South Australia, Australia	0	-34.98	138.57
Chadstone, Victoria, Australia	642	-37.89	145.08
Chatswood Chase Sydney, New South Wales, Australia	0	-33.79	151.19
Colonnades, South Australia, Australia	109	-35.14	138.5
Corio Central, Victoria, Australia	31	-38.08	144.36
Cranbourne Park, Victoria, Australia	0	-38.11	145.28
Currambine Central, Western Australia, Australia	210	-31.74	115.74
DFO Brisbane, Queensland, Australia	29	-27.42	153.08
DFO Essendon, Victoria, Australia	0	-37.73	144.91
DFO Homebush, New South Wales, Australia	0	-33.86	151.08
DFO Moorabbin, Victoria, Australia	276	-37.97	145.09
DFO South Wharf, Victoria, Australia	34	-37.83	144.95
Dianella Plaza, Western Australia, Australia	0	-31.9	115.87
Eastlands, Tasmania, Australia	0	-42.87	147.37
Elizabeth City Centre, South Australia, Australia	132	-34.72	138.67
Ellenbrook Central, Western Australia, Australia	23	-31.78	115.97
Emporium Melbourne, Victoria, Australia	231	-37.81	144.96
Flinders Square, Western Australia, Australia	0	-31.91	115.85
Galleria, Western Australia, Australia	0	-31.9	115.9
Gateway Plaza Leopold, Victoria, Australia	0	-38.19	144.45
Goldfields Plaza, Queensland, Australia	0	-26.19	152.66
Grand Plaza, Queensland, Australia	0	-27.66	153.04
Gympie Central, Queensland, Australia	0	-26.2	152.67
Halls Head Central, Western Australia, Australia	0	-32.55	115.7
Kalamunda Central, Western Australia, Australia	0	-31.97	116.06
Karratha City, Western Australia, Australia	0	-20.74	116.85
Keilor Central, Victoria, Australia	49	-37.73	144.81
Kurralta Central, South Australia, Australia	0	-34.96	138.57
Lake Haven Centre, New South Wales, Australia	0	-33.24	151.5
Lavington Square, New South Wales, Australia	0	-36.05	146.94
Lennox Village, New South Wales, Australia	0	-33.75	150.66
Lidcombe Centre, New South Wales, Australia	0	-33.85	151.05
Livingston Marketplace, Western Australia, Australia	0	-32.09	115.92
Maddington Central, Western Australia, Australia	0	-32.05	115.98
Mandurah Forum, Western Australia, Australia	51	-32.54	115.74
Midland Gate, Western Australia, Australia	0	-31.89	116.01
Mildura Central, Victoria, Australia	80	-34.21	142.14
Milton Village, Queensland, Australia	0	-27.47	153
Mornington Central, Victoria, Australia	0	-38.22	145.04
Mt Ommaey Centre, Queensland, Australia	0	-27.55	152.94
Mount Pleasant Centre, Queensland, Australia	0	-21.12	149.16

Facility	Scope 1 emissions (metric tons CO2e)	Latitude	Longitude
The Myer Centre Brisbane, Queensland, Australia	37	-27.47	153.03
Nepean Village, New South Wales, Australia	135	-33.76	150.69
North Shore Village, Queensland, Australia	0	-26.61	153.08
Northgate, Tasmania, Australia	0	-42.83	147.27
Northland, Victoria, Australia	762	-37.74	145.03
Oakleigh Central, Victoria, Australia	72	-37.9	145.09
Oxenford Village, Queensland, Australia	0	-27.89	153.31
Paradise Centre, Queensland, Australia	15	-28	153.43
QueensPlaza, Queensland, Australia	9	-27.47	153.03
Riverside Plaza, New South Wales, Australia	80	-35.35	149.24
Rockingham Centre, Western Australia, Australia	1	-32.29	115.75
Roselands, New South Wales, Australia	0	-33.94	151.07
Roxburgh Village, Victoria, Australia	100	-37.64	144.93
Runaway Bay Centre, Queensland, Australia	0	-27.91	153.4
Salamander Bay, New South Wales, Australia	0	-32.74	152.11
Stirlings Central, Western Australia, Australia	0	-28.78	114.61
Sunshine Marketplace, Victoria, Australia	0	-37.78	144.83
Taigum Square, Queensland, Australia	257	-27.35	153.05
Terrace Central, New South Wales, Australia	0	-32.76	151.74
The Gateway, Victoria, Australia	0	-38.15	145.2
The Glen, Victoria, Australia	424	-37.88	145.17
Toormina Gardens, New South Wales, Australia	0	-30.35	153.09
Victoria Gardens Shopping Centre, Victoria, Australia	56	-37.82	145
Victoria Park Central, Western Australia, Australia	0	-31.97	115.9
Warnbro Centre, Western Australia, Australia	0	-32.35	115.76
Warriewood Square, New South Wales, Australia	18	-33.7	151.3
Warwick Grove, Western Australia, Australia	77	-31.84	115.81
West End Plaza, New South Wales, Australia	82	-36.08	146.91
Whitsunday Plaza, Queensland, Australia	48	-20.29	148.67
Wodonga Plaza, Victoria, Australia	37	-36.12	146.88

### C7.3c

(C7.3c) Break down your total gross global Scope 1 emissions by business activity.

Activity	Scope 1 emissions (metric tons CO2e)
Heating - gas combustion used for heating	3802
Cooling - refrigerants used in air conditioning systems	741
Back-up generators	393

### C7.5

(C7.5) Break down your total gross global Scope 2 emissions by country/region.

Country/Region	Scope 2, location-based (metric tons CO2e)	Scope 2, market-based (metric tons CO2e)	Purchased and consumed electricity, heat, steam or cooling (MWh)	Purchased and consumed low-carbon electricity, heat, steam or cooling accounted in market-based approach (MWh)
Australia	193917		238497	155

### C7.6

**(C7.6) Indicate which gross global Scope 2 emissions breakdowns you are able to provide.**

By facility

By activity

**C7.6b****(C7.6b) Break down your total gross global Scope 2 emissions by business facility.**

Facility	Scope 2 location-based emissions (metric tons CO2e)	Scope 2, market-based emissions (metric tons CO2e)
Altona Gate, Victoria, Australia	2176	
Armidale Central, New South Wales, Australia	1006	
Bankstown Central, New South Wales, Australia	7483	
Bathurst City Centre, New South Wales, Australia	1013	
Bayside, Victoria, Australia	7145	
Belmont Village, Victoria, Australia	57	
Bentons Square, Victoria, Australia	654	
Box Hill Central (North Precinct), Victoria, Australia	2612	
Box Hill Central (South Precinct), Victoria, Australia	4546	
Brandon Park, Victoria, Australia	1638	
Broadmeadows Central, Victoria, Australia	4926	
Buranda Village, Queensland, Australia	1001	
Carlingford Court, New South Wales, Australia	2313	
Castle Plaza, South Australia, Australia	502	
Chadstone, Victoria, Australia	21488	
Chatswood Chase Sydney, New South Wales, Australia	5649	
Colonnades, South Australia, Australia	1909	
Corio Central, Victoria, Australia	2683	
Cranbourne Park, Victoria, Australia	4588	
Currambine Central, Western Australia, Australia	294	
DFO Brisbane, Queensland, Australia	2379	
DFO Essendon, Victoria, Australia	2408	
DFO Homebush, New South Wales, Australia	2858	
DFO Moorabbin, Victoria, Australia	1163	
DFO South Wharf, Victoria, Australia	8959	
Dianella Plaza, Western Australia, Australia	292	
Eastlands, Tasmania, Australia	188	
Elizabeth City Centre, South Australia, Australia	2528	
Ellenbrook Central, Western Australia, Australia	1336	
Emporium Melbourne, Victoria, Australia	7497	
Flinders Square, Western Australia, Australia	125	
Galleria, Western Australia, Australia	4019	
Gateway Plaza Leopold, Victoria, Australia	981	
Goldfields Plaza, Queensland, Australia	620	
Grand Plaza, Queensland, Australia	3049	
Gympie Central, Queensland, Australia	1781	
Halls Head Central, Western Australia, Australia	468	
Kalamunda Central, Western Australia, Australia	230	
Karratha City, Western Australia, Australia	1048	
Keilor Central, Victoria, Australia	1097	
Kurralta Central, South Australia, Australia	156	
Lake Haven Centre, New South Wales, Australia	1961	
Lavington Square, New South Wales, Australia	1411	
Lennox Village, New South Wales, Australia	337	
Lidcombe Centre, New South Wales, Australia	2856	
Livingston Marketplace, Western Australia, Australia	361	
Maddington Central, Western Australia, Australia	1453	
Mandurah Forum, Western Australia, Australia	1287	

Facility	Scope 2 location-based emissions (metric tons CO2e)	Scope 2, market-based emissions (metric tons CO2e)
Midland Gate, Western Australia, Australia	3246	
Mildura Central, Victoria, Australia	1607	
Milton Village, Queensland, Australia	285	
Mornington Central, Victoria, Australia	460	
Mt Ommaney Centre, Queensland, Australia	3645	
Mount Pleasant Centre, Queensland, Australia	2063	
The Myer Centre Brisbane, Queensland, Australia	5596	
Nepean Village, New South Wales, Australia	1011	
North Shore Village, Queensland, Australia	39	
Northgate, Tasmania, Australia	114	
Northland, Victoria, Australia	10572	
Oakleigh Central, Victoria, Australia	1309	
Oxenford Village, Queensland, Australia	70	
Paradise Centre, Queensland, Australia	3711	
QueensPlaza, Queensland, Australia	2392	
Riverside Plaza, New South Wales, Australia	1012	
Rockingham Centre, Western Australia, Australia	2266	
Roselands, New South Wales, Australia	4168	
Roxburgh Village, Victoria, Australia	1174	
Runaway Bay Centre, Queensland, Australia	2277	
Salamander Bay, New South Wales, Australia	705	
Stirlings Central, Western Australia, Australia	472	
Sunshine Marketplace, Victoria, Australia	1893	
Taigum Square, Queensland, Australia	1095	
Terrace Central, New South Wales, Australia	274	
The Gateway, Victoria, Australia	206	
The Glen, Victoria, Australia	5935	
Toormina Gardens, New South Wales, Australia	754	
Victoria Gardens Shopping Centre, Victoria, Australia	3263	
Victoria Park Central, Western Australia, Australia	184	
Warnbro Centre, Western Australia, Australia	389	
Warriewood Square, New South Wales, Australia	1495	
Warwick Grove, Western Australia, Australia	1144	
West End Plaza, New South Wales, Australia	1172	
Whitsunday Plaza, Queensland, Australia	858	
Wodonga Plaza, Victoria, Australia	528	

## C7.6c

**(C7.6c) Break down your total gross global Scope 2 emissions by business activity.**

Activity	Scope 2, location-based emissions (metric tons CO2e)	Scope 2, market-based emissions (metric tons CO2e)
Lighting	43137	
Heating, Ventilation, and Air-conditioning	141369	
Vertical transport	6251	
General equipment	3160	

## C7.9

**(C7.9) How do your gross global emissions (Scope 1 and 2 combined) for the reporting year compare to those of the previous reporting year?**

Decreased

## C7.9a

**(C7.9a) Identify the reasons for any change in your gross global emissions (Scope 1 and 2 combined) and for each of them specify how your emissions compare to the previous year.**

	Change in emissions (metric tons CO2e)	Direction of change	Emissions value (percentage)	Please explain calculation
Change in renewable energy consumption		<Not Applicable>		No change
Other emissions reduction activities	7809	Decreased	4	Through our Integrated Energy Strategy (IES), an important contributor to the 'Low carbon smart assets' pillar of Vicinity's Sustainability strategy, we have continued to drive improvements in emissions performance by identifying and implementing energy efficiency initiatives. Specific emission reduction initiatives are detailed in question C4.3b, and we have reduced emissions by 7000 tonnes CO2e (Scope 1 emissions) across our portfolio. Calculation explanation: 7,809 tCO2e of emissions reductions during the reporting period, total Scope 1 and Scope 2 emissions in the previous year was 212,447 tCO2e, therefore, $(-7,809 / 212,447) \times 100 = -4\%$
Divestment	14564	Decreased	7	During 2017 we divested 4 assets in our portfolio (Bathurst, Salamander Bay, Terrace Central all in NSW, and Wodonga Plaza in VIC). This has decreased our 2017 absolute emissions by 14,564 tCO2e. Calculation explanation: 14,564 tCO2e reduced by divestment activities during the reporting period, our total Scope 1 and Scope 2 emissions in the previous year was 212,447 tCO2e, therefore $(-14564 / 212,447) \times 100 = -7\%$ .
Acquisitions	1292	Increased	1	During the previous reporting period (2016), Vicinity acquired 1 asset (DFO Brisbane), leading to an increase of 1,292 tCO2e in absolute emissions. Calculation explanation: 1,292 tCO2e were added by investment activity during the reporting period, our total Scope 1 and Scope 2 emissions in the previous year was 212,447 tCO2e, therefore, $(1,292 / 212,447) \times 100 = 1\%$ .
Mergers		<Not Applicable>		No change
Change in output	6778	Increased	3	Change in output for Vicinity relates to changes in our primary product/service - gross lettable area (GLA). GLA has changed from 2016 to 2017, as a result of development projects increasing asset GLA, as well as changes in vacancy rates and therefore a change in the output (via the activity of our retail tenants) of the asset. Such aspects also result in changes to energy use and therefore carbon emissions at our assets. Some of our centres such as Chadstone, DFO South Wharf and Gateway Plaza significantly increased their output (GLA) and carbon emissions during the reporting period, resulting in an increase of 6,778 tCO2e across our portfolio. Calculation explanation: 6,778 tCO2e increase as a result of changes in output (described above), total Scope 1 and Scope 2 emissions in the previous year were 212,447 tCO2e, therefore, $(6,778 / 212,447) \times 100 = +3\%$ .
Change in methodology		<Not Applicable>		No change
Change in boundary		<Not Applicable>		No change
Change in physical operating conditions	328	Increased	0.2	Changes in physical operating conditions result from significant changes in weather (increased hot days and cold days) which have caused a small increase in energy use at selected centres (for example, Penrith NSW had extreme temperature highs during the summer months of the current reporting period, including many days over 40C). Our emissions increased by 328 tCO2e in 2017 compared to 2016. Calculation explanation: 328 tCO2e increase as a result of physical changes in operating conditions, total Scope 1 and Scope 2 emissions in the previous year was 212,447 tCO2e, therefore, $(328 / 212,447) \times 100 = +0.2\%$ .
Unidentified	1121	Increased	1	We monitor and look for reasons to explain any year on year changes in our carbon emissions. In most instances we can quantify and identify these. However, sometimes the range of external factors that influence our greenhouse gas emissions can make it difficult to allocate to a specific cause. In 2017 there was an increase in our emissions by 1,121 tCO2e compared to 2016. Calculation explanation: 1,121 tCO2e increase in emissions from unidentified causes, total Scope 1 and Scope 2 emissions in the previous year was 212,447 tCO2e, therefore, $(1,121 / 212,447) \times 100 = +1\%$ .
Other	742	Decreased	0.3	When an asset is undergoing development, it is common for this to have an impact on the operational performance of that centre (often due to only part of the centre being open for trade). In 2016, development activity at our centres caused a decrease in our emissions of 742 tCO2e compared to 2016. Calculation explanation: 742 tCO2e decrease in emissions as a result of development projects at our assets, total Scope 1 and Scope 2 emissions in the previous year was 212,447 tCO2e, therefore $(742 / 212,447) \times 100 = -0.3\%$

## C7.9b

**(C7.9b) Are your emissions performance calculations in C7.9 and C7.9a based on a location-based Scope 2 emissions figure or a market-based Scope 2 emissions figure?**

## C8. Energy

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### C8.1

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**(C8.1) What percentage of your total operational spend in the reporting year was on energy?**

More than 10% but less than or equal to 15%

### C8.2

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**(C8.2) Select which energy-related activities your organization has undertaken.**

	Indicate whether your organization undertakes this energy-related activity
Consumption of fuel (excluding feedstocks)	Yes
Consumption of purchased or acquired electricity	Yes
Consumption of purchased or acquired heat	No
Consumption of purchased or acquired steam	No
Consumption of purchased or acquired cooling	No
Generation of electricity, heat, steam, or cooling	Yes

### C8.2a

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**(C8.2a) Report your organization's energy consumption totals (excluding feedstocks) in MWh.**

	Heating value	MWh from renewable sources	MWh from non-renewable sources	Total MWh
Consumption of fuel (excluding feedstock)	LHV (lower heating value)	0	22047	22047
Consumption of purchased or acquired electricity	<Not Applicable>	0	216295	216295
Consumption of purchased or acquired heat	<Not Applicable>	<Not Applicable>	<Not Applicable>	<Not Applicable>
Consumption of purchased or acquired steam	<Not Applicable>	<Not Applicable>	<Not Applicable>	<Not Applicable>
Consumption of purchased or acquired cooling	<Not Applicable>	<Not Applicable>	<Not Applicable>	<Not Applicable>
Consumption of self-generated non-fuel renewable energy	<Not Applicable>	155	<Not Applicable>	155
Total energy consumption	<Not Applicable>	155	238342	238497

### C8.2b

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**(C8.2b) Select the applications of your organization's consumption of fuel.**

	Indicate whether your organization undertakes this fuel application
Consumption of fuel for the generation of electricity	Yes
Consumption of fuel for the generation of steam	No
Consumption of fuel for the generation of cooling	No
Consumption of fuel for co-generation or tri-generation	No

## C8.2c

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(C8.2c) State how much fuel in MWh your organization has consumed (excluding feedstocks) by fuel type.

**Fuels (excluding feedstocks)**

Natural Gas

**Heating value**

LHV (lower heating value)

**Total fuel MWh consumed by the organization**

20494

**MWh fuel consumed for the self-generation of electricity**

**MWh fuel consumed for self-generation of heat**

20494

**MWh fuel consumed for self-generation of steam**

<Not Applicable>

**MWh fuel consumed for self-generation of cooling**

<Not Applicable>

**MWh fuel consumed for self- cogeneration or self-trigeneration**

<Not Applicable>

---

**Fuels (excluding feedstocks)**

Diesel

**Heating value**

LHV (lower heating value)

**Total fuel MWh consumed by the organization**

1554

**MWh fuel consumed for the self-generation of electricity**

1554

**MWh fuel consumed for self-generation of heat**

**MWh fuel consumed for self-generation of steam**

<Not Applicable>

**MWh fuel consumed for self-generation of cooling**

<Not Applicable>

**MWh fuel consumed for self- cogeneration or self-trigeneration**

<Not Applicable>

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## C8.2d

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(C8.2d) List the average emission factors of the fuels reported in C8.2c.

**Acetylene**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Agricultural Waste****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Alternative Kiln Fuel (Wastes)****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Animal Fat****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Animal/Bone Meal****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Anthracite Coal****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Asphalt****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Aviation Gasoline****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Bagasse****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Bamboo****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Basic Oxygen Furnace Gas (LD Gas)****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Biodiesel****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Biodiesel Tallow****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Biodiesel Waste Cooking Oil****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Bioethanol****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Biogas****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Biogasoline****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Biomass Municipal Waste**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Biomethane**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Bitumen**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Bituminous Coal**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Black Liquor**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Blast Furnace Gas**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Brown Coal Briquettes (BKB)**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Burning Oil**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Butane**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Butylene**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Charcoal**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Coal****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Coal Tar****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Coke****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Coke Oven Gas****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Coking Coal****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Compressed Natural Gas (CNG)****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Condensate**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Crude Oil**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Crude Oil Extra Heavy**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Crude Oil Heavy**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Crude Oil Light**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Diesel****Emission factor**

70.2

**Unit**

kg CO2e per GJ

**Emission factor source**

National Greenhouse Accounts (NGA) Factors workbook July 2017

**Comment**

No change to emissions factor compared to last year

**Distillate Oil****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Dried Sewage Sludge****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Ethane****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Ethylene****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Fuel Gas**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

**Fuel Oil Number 1**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

**Fuel Oil Number 2**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

**Fuel Oil Number 4**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

**Fuel Oil Number 5**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

**Fuel Oil Number 6**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Gas Coke**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Gas Oil**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Gas Works Gas**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**GCI Coal**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**General Municipal Waste**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Grass

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Hardwood

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Heavy Gas Oil

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Hydrogen

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Industrial Wastes

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Isobutane

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Isobutylene**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Jet Gasoline**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Jet Kerosene**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Kerosene**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Landfill Gas**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Light Distillate**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Lignite Coal**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Liquefied Natural Gas (LNG)**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Liquefied Petroleum Gas (LPG)**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Liquid Biofuel**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Lubricants**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Marine Fuel Oil**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Marine Gas Oil**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Metallurgical Coal**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Methane**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Motor Gasoline**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Naphtha****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Natural Gas****Emission factor**

51.53

**Unit**

kg CO2e per GJ

**Emission factor source**

National Greenhouse Accounts (NGA) Factors workbook July 2017

**Comment**

No change to emissions factor compared to last year

**Natural Gas Liquids (NGL)****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Natural Gasoline****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Non-Biomass Municipal Waste****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Non-Biomass Waste

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Oil Sands

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Oil Shale

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Orimulsion

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Other Petroleum Gas

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Paraffin Waxes

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Patent Fuel****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**PCI Coal****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Peat****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Pentanes Plus****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Petrochemical Feedstocks****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Petrol****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Petroleum Coke****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Petroleum Products****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Pitch****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Plastics****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Primary Solid Biomass**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Propane Gas**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Propane Liquid**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Propylene**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Refinery Feedstocks**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Refinery Gas**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Refinery Oil**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Residual Fuel Oil**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Road Oil**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**SBP**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Shale Oil**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Sludge Gas

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Softwood

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Solid Biomass Waste

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Special Naphtha

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Still Gas

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Straw

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Subbituminous Coal****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Sulphite Lyes****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Tar****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Tar Sands****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Thermal Coal****Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Thermal Coal Commercial**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Thermal Coal Domestic**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Thermal Coal Industrial**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Tires**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Town Gas**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Unfinished Oils**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Vegetable Oil**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Waste Oils**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Waste Paper and Card**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Waste Plastics**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**  
<Not Applicable>

**Comment**  
<Not Applicable>

#### **Waste Tires**

**Emission factor**  
<Not Applicable>

**Unit**  
<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**White Spirit**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Wood**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Wood Chips**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Wood Logs**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

**Wood Pellets**

**Emission factor**

<Not Applicable>

**Unit**

<Not Applicable>

**Emission factor source**

<Not Applicable>

**Comment**

<Not Applicable>

## Wood Waste

### Emission factor

<Not Applicable>

### Unit

<Not Applicable>

### Emission factor source

<Not Applicable>

### Comment

<Not Applicable>

## Other

### Emission factor

<Not Applicable>

### Unit

<Not Applicable>

### Emission factor source

<Not Applicable>

### Comment

<Not Applicable>

## C8.2e

(C8.2e) Provide details on the electricity, heat, steam, and cooling your organization has generated and consumed in the reporting year.

	Total Gross generation (MWh)	Generation that is consumed by the organization (MWh)	Gross generation from renewable sources (MWh)	Generation from renewable sources that is consumed by the organization (MWh)
Electricity	216450	216450	155	155
Heat				
Steam				
Cooling				

## C8.2f

(C8.2f) Provide details on the electricity, heat, steam and/or cooling amounts that were accounted for at a low-carbon emission factor in the market-based Scope 2 figure reported in C6.3.

### Basis for applying a low-carbon emission factor

Off-grid energy consumption from an on-site installation or through a direct line to an off-site generator owned by another company

### Low-carbon technology type

Solar PV

### MWh consumed associated with low-carbon electricity, heat, steam or cooling

155

### Emission factor (in units of metric tons CO<sub>2</sub>e per MWh)

0

### Comment

## C9. Additional metrics

---

### C9.1

---

#### (C9.1) Provide any additional climate-related metrics relevant to your business.

**Description**

Waste

*Waste diverted from landfill (as a % of total waste)*

**Metric value**

39

**Metric numerator**

22,515

**Metric denominator (intensity metric only)**

57,195

**% change from previous year**

9

**Direction of change**

Increased

**Please explain**

Vicinity measures our waste management performance based on our overall diversion from landfill (or recycling rate) as a proportion of the total waste generated, rather than monitoring performance against volume-based waste metrics. This is because we have very little direct control over the volume of waste that is generated at our centres, as it is largely produced by our retail tenants and consumers. The volume of waste generated also increases as business activity at our centres increases. However, Vicinity has direct control over the recycling facilities available at our centres and the education programs available to our retailers on appropriate disposal of waste, and as such monitors performance in line with our operational control and relating to the proportion of waste diverted from landfill / recycled. Diversion of waste from landfill (i.e. increasing our recycling rate) is a key focus of Vicinity's Environment Improvement Program, which in turn forms an important part of the 'Low carbon smart assets' pillar of our Sustainability strategy. The more waste we can divert from landfill the lower our Scope 3 emissions will be. In 2017, we achieved an average diversion rate of 39% (excluding waste to energy) through a focus on source separation recovery and recycling. This is an increase (being a positive outcome) from our 2016 recycling rate of 30% and has reduced our total waste disposed to landfill as a proportion of total waste generated.

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## C10. Verification

---

### C10.1

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#### (C10.1) Indicate the verification/assurance status that applies to your reported emissions.

	Verification/assurance status
Scope 1	Third-party verification or assurance process in place
Scope 2 (location-based or market-based)	Third-party verification or assurance process in place
Scope 3	Third-party verification or assurance process in place

### C10.1a

---

**(C10.1a) Provide further details of the verification/assurance undertaken for your Scope 1 and/or Scope 2 emissions and attach the relevant statements.**

**Scope**

Scope 1

**Verification or assurance cycle in place**

Annual process

**Status in the current reporting year**

Complete

**Type of verification or assurance**

Limited assurance

**Attach the statement**

[CY17 VCX - FINAL CDP Assurance Statement\\_Aug.pdf](#)

**Page/ section reference**

Page 1

**Relevant standard**

ISAE3000

**Proportion of reported emissions verified (%)**

100

[CY17 VCX - FINAL CDP Assurance Statement\\_Aug.pdf](#)

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**Scope**

Scope 2 location-based

**Verification or assurance cycle in place**

Annual process

**Status in the current reporting year**

Complete

**Type of verification or assurance**

Limited assurance

**Attach the statement**

[CY17 VCX - FINAL CDP Assurance Statement\\_Aug.pdf](#)

**Page/ section reference**

Page 1

**Relevant standard**

ISAE3000

**Proportion of reported emissions verified (%)**

100

[CY17 VCX - FINAL CDP Assurance Statement\\_Aug.pdf](#)

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## C10.1b

---

**(C10.1b) Provide further details of the verification/assurance undertaken for your Scope 3 emissions and attach the relevant statements.**

**Scope**

Scope 3- all relevant categories

**Verification or assurance cycle in place**

Annual process

**Status in the current reporting year**

Complete

**Attach the statement**

[CY17 VCX - FINAL CDP Assurance Statement\\_Aug.pdf](#)

## C10.2

**(C10.2) Do you verify any climate-related information reported in your CDP disclosure other than the emissions figures reported in C6.1, C6.3, and C6.5?**

Yes

## C10.2a

**(C10.2a) Which data points within your CDP disclosure have been verified, and which verification standards were used?**

Disclosure module verification relates to	Data verified	Verification standard	Please explain
C6. Emissions data	Year on year emissions intensity figure <i>Carbon emissions (Scope 1+2) intensity (metric tonnes of CO2e per square meters GLA)</i>	ISAE3000	Vicinity has completed external limited assurance over the carbon emissions (scope 1 and 2) intensity metric per square meter of gross lettable area (GLA) reported in section C6.10. This metric is listed within the attached Assurance Statement. <a href="#">CY17 VCX - FINAL CDP Assurance Statement_Aug.pdf</a>
C8. Energy	Other, please specify (Total energy consumption (MwH)) <i>Total of energy consumption in megawatt hours (MwH)</i>	ISAE3000	Vicinity has completed external limited assurance over the total energy consumption metric reported in section C8.2a. This metric is listed within the attached Assurance Statement attached. <a href="#">CY17 VCX - FINAL CDP Assurance Statement_Aug.pdf</a>
C9. Additional metrics	Other, please specify (Waste diverted to landfill (%)) <i>Waste diverted from landfill (% of total waste)</i>	ISAE3000	Vicinity has completed external limited assurance over the waste diverted from landfill (recycling rate) metric reported in section C9.1. This metric is listed within the attached Assurance Statement. <a href="#">CY17 VCX - FINAL CDP Assurance Statement_Aug.pdf</a>

## C11. Carbon pricing

## C11.1

**(C11.1) Are any of your operations or activities regulated by a carbon pricing system (i.e. ETS, Cap & Trade or Carbon Tax)?**

No, but we anticipate being regulated in the next three years

## C11.1d

**(C11.1d) What is your strategy for complying with the systems in which you participate or anticipate participating?**

The Australian Government's proposed energy policy - the National Energy Guarantee (NEG) scheme being developed by the COAG Energy Council and Energy Security Board (ESB) aims to provide a platform for putting downward pressure on Australia's energy markets while including emissions reduction and energy reliability requirements. The emissions reduction target proposed under the NEG is 26% reduction on 2005 levels by 2030, to be achieved by a gradual increase in emissions reduction over time. The policy has not yet been finalised, however it has created a landscape of uncertainty surrounding an implicit price on carbon reduction, available government funding for carbon abatement and renewable energy activities, the cost effectiveness of onsite renewable energy generation, carbon accounting methodologies and the role of external carbon offsets.

Given that Vicinity's electricity is largely sourced from external energy sources (that is, the national electricity grid), any legislative changes that influence wholesale electricity prices will have a significant impact on our operational costs. In addition, Vicinity derives ancillary income from on-selling electricity to our retail tenants at our centres, and any increases in grid electricity prices would therefore result in reduced profit margins from this income source.

Vicinity takes a long-term approach to energy management to ensure our business is resilient to variability (including increases) in grid electricity prices. In 2016, Vicinity completed modelling to identify the potential impact of changes in the electricity market (including price changes) on our business, which included the identification of potential decarbonisation pathways for our asset portfolio as a way to protect the business from such changes. The modelling identified significant commercial benefits for Vicinity in investing in renewable energy (onsite solar) and energy efficiency technologies. Should legislative changes come into effect in favour of renewable energy/climate change mitigation it would make these investments even more cost effective and provide shorter return on investments. Vicinity has developed an Integrated Energy Strategy which includes onsite renewable energy and a scaled up energy efficiency program to minimise the impacts of electricity price increases and achieve significant carbon reductions across our portfolio. Stage 1 of the renewable energy program commenced in FY18 and now underway includes solar installations at five centres across South Australia and Western Australia, at a cost of \$28M. Stage 2 will commence in FY19 and will include approximately a \$50M investment. Vicinity also implements significant carbon reduction measures through our development projects which are informed by our Sustainable Design Brief.

As part of our Integrated Energy Strategy, Vicinity is planning to participate more broadly in the Australian Government's Renewable Energy Target (RET) which is a scheme to encourage investment into renewable energy generation of electricity in Australia's electricity sector. Vicinity solar rollout plans includes the involvement through the creation and sale of large-scale generation certificates (LGCs). Vicinity also participates in voluntary state-based energy saving incentive schemes such as the NSW Energy Savings Scheme (ESS) and the Victorian Energy Upgrades program that rewards business for implementing recognised energy efficiency measures such as high efficiency lighting, and changes in electricity consumption against an established baseline. Whilst Vicinity participates in these incentives schemes for energy efficiency, renewable energy and ultimately carbon reduction, Vicinity does not consider these to be full scaled carbon pricing or emissions trading schemes.

Vicinity actively engages in advocacy activities relating to the introduction of a price on carbon and other incentives to increase business certainty relating to investment in renewables and energy efficiency measures via our membership of the Property Council of Australia.

## C11.2

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**(C11.2) Has your organization originated or purchased any project-based carbon credits within the reporting period?**

No

## C11.3

---

**(C11.3) Does your organization use an internal price on carbon?**

No, but we anticipate doing so in the next two years

## C12. Engagement

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### C12.1

---

**(C12.1) Do you engage with your value chain on climate-related issues?**

Yes, our suppliers

Yes, our customers

Yes, other partners in the value chain

## C12.1a

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### (C12.1a) Provide details of your climate-related supplier engagement strategy.

#### Type of engagement

Compliance & onboarding

#### Details of engagement

Included climate change in supplier selection / management mechanism

#### % of suppliers by number

1

#### % total procurement spend (direct and indirect)

84

#### % Scope 3 emissions as reported in C6.5

33

#### Rationale for the coverage of your engagement

Strategic suppliers who are considered high value and high risk

#### Impact of engagement, including measures of success

Vicinity considers sustainability risks on a commodity by commodity basis, in particular, when a high value or high risk commodity is procured through a tender process. This ensures that our corporate and asset specific sustainability expectations and requirements (including environmental performance relating to energy and waste where relevant) are integrated into the supplier evaluation and selection process, and that we form partnerships with suppliers who have a shared commitment to our sustainability objectives. For example, Vicinity's national waste management services tender directly linked diversion from landfill targets with the KPIs of the incoming supplier in order to reduce related Scope 3 carbon emissions associated with sending waste to landfill.

#### Comment

---

#### Type of engagement

Compliance & onboarding

#### Details of engagement

Code of conduct featuring climate change KPIs

#### % of suppliers by number

100

#### % total procurement spend (direct and indirect)

100

#### % Scope 3 emissions as reported in C6.5

100

#### Rationale for the coverage of your engagement

All suppliers

#### Impact of engagement, including measures of success

Our Supplier Sustainability Code of Practice is included in all of our tender and contract evaluations, and outlines Vicinity's Sustainability Strategy (including 'Low Carbon Smart Assets' and 'Climate Resilience' objectives) as well as our expectations of our suppliers, strategic objectives, and requirements for ongoing assessment and collaboration. In addition, Vicinity's Sustainable Procurement Policy, Environment Policy and Climate Policy (available through our website: <http://sustainability.vicinity.com.au/governance/sustainability-governance/learn-more>) outline our commitment to collaborate with suppliers to reduce our collective environmental impacts, both in our operations, as well as in upstream and downstream activities.

#### Comment

---

#### Type of engagement

Engagement & incentivization (changing supplier behavior)

#### Details of engagement

Offer financial incentives for suppliers who reduce your downstream emissions (Scopes 3)

**% of suppliers by number**

1

**% total procurement spend (direct and indirect)**

84

**% Scope 3 emissions as reported in C6.5**

33

**Rationale for the coverage of your engagement**

Strategic suppliers who are considered high value and high risk

**Impact of engagement, including measures of success**

Vicinity has included various relevant sustainability-related requirements in contracts with our critical suppliers, representing 84% of our operational spend. This ensures that our corporate and asset specific sustainability requirements (including environmental performance relating to energy and waste) are integrated into and implemented through supplier contracts. Suppliers are managed using Vicinity's Contract Management Strategy, which ensures alignment with and achievement of Vicinity's agreed corporate and contractual objectives, including compliance with our Supplier Sustainability Code of Practice. For example, our national contracts for management of waste services include targets for suppliers relating to diversion of waste from landfill, which reduces our Scope 3 carbon emissions. This includes a financial incentive to meet waste diversion from landfill targets as stipulated in our national contracts. Through this engagement, we were achieving an average diversion rate of 39% at the end of 2017 reporting year (up from 36% in 2016) driven through source separation recovery and recycling. We also proactively engage with our strategic suppliers, such as those carrying out cleaning, waste, maintenance and mechanical services, throughout the year to monitor their performance and implement industry best practices focused on the material impacts of the services they provide. This includes initiatives such as the use of environmentally-friendly cleaning products, state of the art recycling practices that successfully engage our tenants, procurement through social enterprises or workplace audits to ensure appropriate payment of subcontractors in line with contract/legislation.

**Comment**

---

**Type of engagement**

Information collection (understanding supplier behavior)

**Details of engagement**

Other, please specify (Collect information every 3 years)

- *Other, please specify: Collect climate change and carbon information at every three years from suppliers*

**% of suppliers by number**

100

**% total procurement spend (direct and indirect)**

100

**% Scope 3 emissions as reported in C6.5**

100

**Rationale for the coverage of your engagement**

All suppliers

**Impact of engagement, including measures of success**

Vicinity's Supplier Sustainability Code of Practice requires all suppliers to provide updated sustainability information every three years or in the event of a material change in the ownership of the business or services provided to Vicinity through completion of our Supplier Sustainability Questionnaire. The questionnaire covers supplier environmental practices, including those related to energy, emissions and waste. Some suppliers (such as waste management service providers) are required to report monthly asset level waste and recycling data to Vicinity, which is used to assess each asset's performance against their recycling objectives (and related Scope 3 emissions).

**Comment**

---

**Type of engagement**

Innovation & collaboration (changing markets)

**Details of engagement**

Run a campaign to encourage innovation to reduce climate impacts on products and services

**% of suppliers by number**

100

**% total procurement spend (direct and indirect)**

100

**% Scope 3 emissions as reported in C6.5**

100

**Rationale for the coverage of your engagement**

All suppliers

**Impact of engagement, including measures of success**

Vicinity's Operations and Procurement teams undertake technology trials and deployments across the portfolio on a regular basis to improve operational efficiencies and performance and identify technologies that add value and have potential for expansion across our portfolio. In the last 12 months the National Operations innovation pipeline has delivered over 100 technology initiatives to meet National Operations' strategic objectives. Initiatives implemented include, integrated energy management, automation and artificial intelligence, demand-based services, social procurement, vendor management and capital management. Alignment with National Operations' strategic objectives and ability to innovate with new technology are a key consideration in the supplier selection process and ongoing collaboration.

**Comment**

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**C12.1b**

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**(C12.1b) Give details of your climate-related engagement strategy with your customers.****Type of engagement**

Education/information sharing

**Details of engagement**

Run an engagement campaign to education customers about your climate change performance and strategy

**Size of engagement**

100

**% Scope 3 emissions as reported in C6.5**

64

**Please explain the rationale for selecting this group of customers and scope of engagement**

All retail tenants at our centres

**Impact of engagement, including measures of success**

The majority (approximately 95%) of waste generated at our assets is created by our retailers, largely through packaging materials and food waste. It is Vicinity's responsibility to provide infrastructure and guidance to tenants that facilitates and encourages high waste recycling rates. Therefore, a key component of Vicinity's waste management and recycling program is tenant engagement, which focuses on educating our tenants on the centre's recycling program, targets, and the correct disposal of waste into the various recycling streams. We have also developed a retailer recycling education video to educate our tenants about better recycling practices, which can be found here: <https://youtu.be/mrbjnFXmq8k>. Through this engagement, Vicinity has achieved an average portfolio wide recycling rate of 39% at the end of 2017 (up from 36% in 2016), reducing our Scope 3 emissions. Vicinity also provides monthly energy use data to our retail tenants who purchase electricity through our embedded network to help drive efficiency improvements. In addition, our retail design guidelines include minimum sustainability requirements and best practice principles in tenant shop fit outs and refurbishments to encourage our retail tenants to reduce their overall energy, waste and environmental footprint in the design and construction of shop fit outs.

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**Type of engagement**

Education/information sharing

**Details of engagement**

Run an engagement campaign to education customers about your climate change performance and strategy

**Size of engagement**

100

**% Scope 3 emissions as reported in C6.5**

100

**Please explain the rationale for selecting this group of customers and scope of engagement**

All retail tenants at our centres

**Impact of engagement, including measures of success**

Vicinity discloses our sustainability and climate change related strategy and performance through our online sustainability reporting website: <http://sustainability.vicinity.com.au>, which is our key platform for engaging and disseminating information to all stakeholders (including our retail tenants and centre visitors). In addition, Vicinity's Retailer Handbook is provided to all tenants and includes information about Vicinity's Sustainability strategy and environment improvement program, which outlines our initiatives to improve energy efficiency, waste management and recycling.

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**Type of engagement**

Education/information sharing

**Details of engagement**

Share information about your products and relevant certification schemes (i.e. Energy STAR)

**Size of engagement**

100

**% Scope 3 emissions as reported in C6.5**

100

**Please explain the rationale for selecting this group of customers and scope of engagement**

All retail tenants at our centres

**Impact of engagement, including measures of success**

Vicinity has obtained Green Star Performance Ratings for all assets in our portfolio, as well as NABERS Energy and Water Ratings at the majority of centres. We publicly disclose asset level ratings and certifications on our Sustainability website (available at [http://sustainability.vicinity.com.au/media/6369153/vcx-fy17-sustainability-performance-pack\\_final.xlsx](http://sustainability.vicinity.com.au/media/6369153/vcx-fy17-sustainability-performance-pack_final.xlsx)), which are accessible to all our tenants. We also directly engage with our tenants to discuss potential areas for collaboration in sustainability and promote our asset level ratings as a part of these collaborations.

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**Type of engagement**

Other, please specify (Information sharing: Climate Resilience)

- *Other: Education, information sharing and collaboration related to climate resilience*

**Details of engagement**

<Not Applicable>

**Size of engagement**

100

**% Scope 3 emissions as reported in C6.5****Please explain the rationale for selecting this group of customers and scope of engagement**

Our Crisis and Emergency Management System covers all tenants at our centres.

**Impact of engagement, including measures of success**

In addition to Vicinity's climate change mitigation/carbon reduction efforts, we educate and collaborate with our tenants on Vicinity's approach to climate resilience. At the corporate level, we communicate our approach to climate resilience through our sustainability website (at <http://sustainability.vicinity.com.au/sustainable-destinations/climate-resilience/learn-more/>) including an overview of our risk assessments and management strategies to date. At the asset level, Vicinity has a Crisis and Emergency Management system and associated guidelines to respond to extreme weather events such as cyclones, high winds, heatwaves and flooding, which outline guidelines for communication with/information dissemination to tenants in the lead up to and during extreme weather events. This helps centres to remain open for trade and/or respond appropriately in the lead up to and during such events, and ensures our tenants understand our response actions (and their requirements within these), minimising disruptions to centre operations and ensuring the safety of all staff and the public.

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## C12.1c

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**(C12.1c) Give details of your climate-related engagement strategy with other partners in the value chain.**

Vicinity engages with our joint venture partners and wholesale fund investors (known as our 'strategic partners') to ensure that our 'Low Carbon Smart Assets' and 'Climate Resilience' programs under the Sustainability Strategy and other joint sustainability initiatives are implemented at our co-owned and/or managed centres. In addition to communicating our overall strategy, approach and performance through our sustainability website (<http://sustainability.vicinity.com.au>), we provide quarterly reports to our strategic partners to inform them of asset performance and initiatives being implemented with regards to energy and water efficiency, waste and recycling. We also respond to their annual information requests related to corporate and asset level

sustainability policies, practices and performance, including those relating to climate change, energy and waste management. Furthermore, we engage with strategic partners through our materiality reviews conducted every two years to understand their views on material long-term ESG issues for Vicinity.

## C12.3

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**(C12.3) Do you engage in activities that could either directly or indirectly influence public policy on climate-related issues through any of the following?**

Trade associations

## C12.3b

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**(C12.3b) Are you on the board of any trade associations or do you provide funding beyond membership?**

Yes

## C12.3c

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**(C12.3c) Enter the details of those trade associations that are likely to take a position on climate change legislation.**

**Trade association**

Property Council of Australia (PCA)

**Is your position on climate change consistent with theirs?**

Consistent

**Please explain the trade association's position**

The PCA's principal service to member organisations is to champion their interests in the political arena. With regards to sustainability, the PCA advocates for and promotes policies that improve and incentivise the uptake of best practice energy efficiency and renewable energy initiatives, recognising the property sector's ability to significantly reduce Australia's carbon emissions and with the aim of providing its member base with certainty for investment in such technologies.

**How have you, or are you attempting to, influence the position?**

Vicinity continues to work with the PCA to support their positions, policies, guidelines and advocacy work relevant to climate change risks and opportunities. Vicinity's CEO and Managing Director (Grant Kelley) sits on the Property Council of Australia's Board of Directors (see

[https://propertycouncil.com.au/Web/About\\_Us/Board\\_of\\_Directors/Web/About\\_us/Key\\_info/Board\\_of\\_Directors.aspx?CommitteeCode=DIRECTOR-NAT&hkey=17cf924e-b15f-4c59-8561-c6fd0d1925c8](https://propertycouncil.com.au/Web/About_Us/Board_of_Directors/Web/About_us/Key_info/Board_of_Directors.aspx?CommitteeCode=DIRECTOR-NAT&hkey=17cf924e-b15f-4c59-8561-c6fd0d1925c8)).

Vicinity's General Manager Sustainability (Melissa Schulz) sits on the Property Council of Australia's Sustainability Roundtable (see membership at [http://www.propertycouncil.com.au/Web/About\\_Us/View\\_Committees/Web/About\\_us/Comm/View\\_Committees.aspx](http://www.propertycouncil.com.au/Web/About_Us/View_Committees/Web/About_us/Comm/View_Committees.aspx)).

As part of our membership, Vicinity has supported and provided feedback on PCA's advocacy work in relation to policy matters including the Energy Security Board's Consultation Paper 'National Energy Guarantee: Draft consultation paper' and the Australian Building Codes Board's Public Comment Draft of the National Construction Code (NCC) 2019 Section J on building energy efficiency requirement (these submissions are available here:

[https://www.propertycouncil.com.au/Web/Advocacy/Submissions/Overview/Web/Advocacy/LibrarySubmissions/Submission\\_s\\_Listings.aspx?hkey=3b886afc-a961-450c-9626-f6482245bc3a&iSession=56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7](https://www.propertycouncil.com.au/Web/Advocacy/Submissions/Overview/Web/Advocacy/LibrarySubmissions/Submission_s_Listings.aspx?hkey=3b886afc-a961-450c-9626-f6482245bc3a&iSession=56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7)).

We have additionally contributed to the development of a property sector wide position on energy, which has informed the advocacy for a number of key policies, which are summarised here:

[https://www.propertycouncil.com.au/Web/Advocacy/Advocacy\\_Priorities/Sustainability/Web/Advocacy/Priority/Sustainability.aspx?hkey=daecae2b-31f8-44d9-8c43-ae35b4cf0b30&iSession=56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7](https://www.propertycouncil.com.au/Web/Advocacy/Advocacy_Priorities/Sustainability/Web/Advocacy/Priority/Sustainability.aspx?hkey=daecae2b-31f8-44d9-8c43-ae35b4cf0b30&iSession=56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7,56d4845ddff04af7a6d5f16a545b68d7).

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**Trade association**

Shopping Centre Council of Australia (SCCA)

**Is your position on climate change consistent with theirs?**

Consistent

### **Please explain the trade association's position**

The SCCA represents its members on all public policy and regulatory matters relevant to retail property nationally and in all states and territories. This includes issues such as retail tenancy regulation; competition policy; trading hours; land valuation; taxation; planning, development and sustainability; security; infrastructure; and utilities.

### **How have you, or are you attempting to, influence the position?**

Vicinity's CEO (Grant Kelley) sits on the Shopping Centre Council of Australia's Board of Directors (<http://www.scca.org.au/about-us/board-of-directors/>). Vicinity has served in a number of SCCA advisory panels, contributing to discussions on issues such as: Review of Regulatory Arrangements for Embedded Networks; Industry feedback on the Finkel Review on the national electricity market; and, The NSW container deposit scheme. Submissions are publicly available here: <http://www.scca.org.au/advocacy-agenda/energy-policy-sustainability/>. Additionally, ongoing advocacy work is further discussed through SCCA's weekly newsletters, available here: <http://www.scca.org.au/research-publications/shop-talk-newsletter/>

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### **Trade association**

Green Building Council of Australia (GBCA)

### **Is your position on climate change consistent with theirs?**

Consistent

### **Please explain the trade association's position**

The Green Building Council's vision is to create healthy, resilient and positive places for people and the natural environment, and their purpose is to sustainable transformation of Australia's built environment through the adoption of green building practices through market-based solutions. The GBCA promotes green building programs, technologies, design practices and operations as well as the integration of green building initiatives into mainstream design, construction and operation of buildings through the Green Star rating system.

### **How have you, or are you attempting to, influence the position?**

Vicinity's Chief Investment Officer (Michael O'Brien) sits on the GBCA's Board of Directors (<http://new.gbca.org.au/about/board/>). As a member organisation, Vicinity contributes to GBCA's submissions to all levels of government on a range of issues relating to green buildings and sustainable communities (including those relating to climate change issues). Vicinity also uses GBCA's Green Star Design and As Built frameworks for certification of our development projects, and the Green Star Performance tool to benchmark the operational performance of our entire asset portfolio, and is a key contributor to GBCA led reviews and updates made to such frameworks.

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## C12.3f

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### **(C12.3f) What processes do you have in place to ensure that all of your direct and indirect activities that influence policy are consistent with your overall climate change strategy?**

Vicinity's Sustainability strategy typically directs which topics we become actively engaged in through our industry membership base and those where we are less active, as well as areas relating to or imposing new regulatory requirements on our business. Informed by an assessment of our material issues, Vicinity's Sustainability focus areas are often similar to our industry peers, particularly where climate adaptation and mitigation is concerned, meaning there is usually good alignment between our areas of interest and those being advocated through our industry memberships.

**(a) Method of engagement:** Vicinity is a member organisation of a number of industry associations such as the Property Council of Australia (PCA), Shopping Centre Council of Australia (SCCA) and the Green Building Council of Australia (GBCA), who engage on our behalf directly with policy-makers. Vicinity's CEO (Grant Kelley) sits on the PCA and SCCA board of directors, our CIO (Michael O'Brien) sits on GBCA's board of directors, and Vicinity's General Manager Sustainability (Melissa Schulz) sits on the PCA Sustainability Roundtable.

**(b) Topics of engagement:** Topics of engagement generally relate to proposed changes to existing legislation, as well as any newly proposed regulation with regards to national and state based energy and climate change policy. For example, through the above mentioned industry associations, Vicinity has participated in and provided feedback on the Australian government's Finkel Review on security of the national electricity market, the National Construction Code (NCC) 2019 and proposed changes to Section J (building energy efficiency requirement), the Australian government's Draft Consultation Paper on the introduction of a National Energy Guarantee and related impacts on the property sector and has supported legislative changes that offer incentives for the uptake of onsite renewables such as solar.

**(c) Nature of Engagement:** Vicinity sits on industry body working groups to draft policy and legislation, and provide feedback on other proposed actions on climate related mitigation or adaptation. We do this through providing research and practical examples and expected outcomes of government policy changes on our asset portfolio and business operations. Sometimes our engagement is in support of climate related policies and at other times it is against such policies, particularly where proposed changes do not appear to have considered the practicality for retail property and there are barriers to implementation.

**(d) Results of our advocacy actions:** Our actions have encouraged the development and implementation of practical, low cost carbon mitigation actions and have endorsed greater disclosure with regards to climate related approaches and performance at the asset and corporate level.

## C12.4

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**(C12.4) Have you published information about your organization's response to climate change and GHG emissions performance for this reporting year in places other than in your CDP response? If so, please attach the publication(s).**

**Publication**

In other regulatory filings

**Status**

Complete

**Attach the document**

[vcx-2018-annual-report.pdf](#)

**Content elements**

Governance  
Strategy  
Risks & opportunities  
Emissions figures  
Emission targets  
Other metrics

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**Publication**

In voluntary sustainability report

*Vicinity undertakes our annual voluntary sustainability reporting through our website <http://sustainability.vicinity.com.au/>. Extracts of related sections of the website are attached.*

**Status**

Underway – previous year attached

**Attach the document**

[FY17 Sustainability website content.pdf](#)

**Content elements**

Governance  
Strategy  
Risks & opportunities  
Emissions figures  
Emission targets  
Other metrics  
Other, please specify (Waste to landfill, energy use/intensity)

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**Publication**

In voluntary communications

**Status**

Complete

**Attach the document**

[Australia's largest investment in solar for shopping centres.pdf](#)

**Content elements**

Strategy

Other, please specify (renewable energy targets)

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**Publication**

In voluntary communications

**Status**

Complete

**Attach the document**

[Vicinity Centres corporate website - Sustainability.pdf](#)

**Content elements**

Strategy

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## C14. Signoff

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### C-FI

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**(C-FI) Use this field to provide any additional information or context that you feel is relevant to your organization's response. Please note that this field is optional and is not scored.**

### C14.1

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**(C14.1) Provide details for the person that has signed off (approved) your CDP climate change response.**

	Job title	Corresponding job category
Row 1	Chief Investment Officer (CIO)	Other C-Suite Officer <i>Michael O'Brien, Chief Investment Officer (CIO), Vicinity Centres</i>

## Submit your response

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**In which language are you submitting your response?**

English

**Please confirm below**

I have read and accept the applicable Terms



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