Making a Difference:
Contributions and Achievements of Carbon Neutral Adelaide Partners
Carbon Neutral Adelaide Founding Partners

*Carbon Neutral Adelaide’s first Ambassador

- 1 Million Women
- 100% Renewables SA
- AA Energy Consulting
- Aboriginal Carbon Fund
- Accumulus Energy Group
- Adelaide and Mount Lofty Ranges NRM Board
- Adelaide Central Markets Authority
- Adelaide Convention Centre
- Adelaide Green Clean
- Adelaide Solar Services
- Adelaide Solar Systems
- Adelaide Sustainability Association
- Adelaide Sustainable Building Network
- Alerton Australia
- Alternative Technology Association
- Ametalin
- Anvil Capital
- Aristore
- Aurecon
- Austin Bloom
- Australian CleanTech
- AZZO
- Balance Carbon
- Bank Australia
- BBQ Buoys
- Biodiverse Carbon Conservation
- Boileau Business Solutions
- Bowden Print Group
- Buddy Platform
- CAPS
- Changing Weather
- Cherry Energy Solutions
- City of Adelaide
- CitySwitch Green Office
- Climate Change Services
- Climate-KIC Australia
- Climate Works Australia
- CMinus
- Committee for Adelaide
- Community Energy Action SA
- Conservation SA
- Cool or Cosy
- CORENA
- Cundall
- Demand Manager
- Dematec
- Department for Education and Child Development
- Department of Environment, Water and Natural Resources
- Doctors for the Environment Australia
dsquared Consulting
- Eco Office Supplies
- EcoCaddy
- EcoUrbane Building Group
- Ecovantage
- EfficientSee
- Energie Australia
- Energy Efficiency Council of Australia
- Enerven
- Eureka Environmental Upgrade Finance
- Finsbury Green
- Frenchenviro
- Fuji Xerox
- Fulton Hogan
- Generate Energy (GNR8NRG)
- Glaciem Cooling
- GoGet
- Gogo Events
- Goodhouse Architecture
- Green Building Council of Australia
- Greening Australia SA
- H2U – the Hydrogen Utility™
- Hames Sharley
- ICLEI – Local Governments for Sustainability
- Jeffries Group
- JLB
- KESAB Environmental Solutions
- Kingspan Insulation
- Knight Frank
- Lifecycles
- Lighting and Integration
- Lucid Consulting
- Lumen Studio
- MAC Energy Efficiency Group
- Microsoft
- Mott MacDonald
- My Car
- Nunkuwarrin Yunti of South Australia Inc
- Off-grid Energy Australia
- Oxigen
- Oz Harvest
- Pangolin Associates
- Planet Ark Power
- Property Council of Australia (SA)
- Rawtec
- Renew Adelaide
- Renewable Cities Australia
- Ricoh Australia
- SA Water
- Schneider Electric
- Seed Consulting Services
- Siemens
- Sigma Global
- SIMEC ZEN Energy
- Sol Energy
- Solar Storage Australia
- SolarQuotes
- Solar Warehouse Australia
- South Australia Police
- South Australia Tourism Industry Council (SATIC)
- South Pole
- Square Mile Tours
- St John’s Youth Services
- Statewide Super
- Strategy. Policy. Research
- Studio Open
- Suntrix
- Sustainability House
- Sustainable Business Consultants
- Tandem Energy
- Tempus Energy
- The Culshaw Group of Companies
- The Solar Project
- The William Bligh
- Thomson Rossi
- Tim Jarvis
- Timelapse Adelaide
- Trees for Life
- Uniting Communities*
- University of Adelaide
- University of South Australia’s Research Node for Low Carbon Living
- Urban Ecology Australia
- Wallmans Lawyers
- Warwick O’Brien Architects
- Wax Design
- WOMADelaide
- Your Nursing Agency
Beyond Carbon Neutral “leading a low carbon future” & U City Redevelopment Project

Uniting Communities is a carbon neutral leader being the first South Australian organisation and the first registered charity in Australia to receive federal certification for carbon neutrality. Following a Board led initiative with an environmental, social and financial motivation, Uniting Communities has, since their journey began in 2010, reduced its emissions by over 30% from across its entire organisation which operates from 60 sites, with the greatest reduction at its head office in Pitt Street, Adelaide.

Primary initiatives include behaviour change, the conversion from petrol to hybrid electric vehicles for 75% of the organisation’s fleet, reduction in paper usage by moving to paperless practices, partnering with low carbon suppliers, an overhaul of waste management practices and electricity reduction activities including lighting upgrades.

Uniting Communities is an active participant in creating carbon reduction awareness, regularly speaking about the benefits of becoming carbon neutral and is often asked for assistance by others. Uniting Communities is committed to pushing the boundaries when it comes to reducing carbon emissions.

‘We are acutely aware of the emerging impacts of climate change and our responsibility in taking action in the interests of our clients, staff, volunteers and the broader community. The process of becoming a carbon neutral organisation has led to significant operational savings, improved efficiencies and positive recognition for the leadership we have taken. We are proud of our investment in the future of Uniting Communities, the South Australian community we serve and our planet.’

Simon Schrapel - Chief Executive, Uniting Communities
Anvil Capital purchased 1 King William Street in May 2010 with the vision of re-positioning the building back to its former glory days as one of Adelaide’s most iconic gateway buildings. The refurbishment has captured all elements of the building from façade, cosmetics and building services.

The upgrade of the building services, undertaken with Lucid Consulting Australia, has delivered an energy efficient building with a 69% reduction in annual base building greenhouse gas emissions (1,742 tonnes CO2-e p.a.), a 28% reduction of electrical peak demand, a 46% low carbon energy contribution and a 9% renewable energy contribution from the solar photovoltaic array.

The refurbishment has also delivered the highest provision of cyclist end of trip facilities for any commercial building in the Adelaide CBD, with 167 bike parks, 14 showers and 250 lockers. There are also external and internal green walls to add local urban amenity, a real time energy tracking electronic dashboard display within the foyer and the City of Adelaide Gresham Place outdoor dining and pedestrian plaza area.

‘Our collaborative project has positioned 1 King William as the market leader in environmental sustainability and energy efficiency, demonstrating leadership, action and outcomes across Carbon Neutral Adelaide’s 5 Action Pathways. The Project transformed the 1960s building into a contemporary ‘A Grade’ asset that enhances the productivity and wellbeing of over 1,000 occupants and visitors every day. It is a clear example of the benefits of leveraging off the embodied energy within existing buildings, with the upgrade of our existing building stock being vital to improving the sustainability of Adelaide.’

Adam Learmonth - Director, Anvil Capital
Glaciem Cooling Technologies is driven as a business by two fundamental principles: firstly to develop world leading cooling technologies that deliver real energy efficiency improvements and carbon emission reductions; and secondly, to advocate for change, sharing our expertise to progress the carbon neutrality conversation and enabling others to understand the facts associated with energy management into the future.

Glaciem has developed an integrated cooling solution to help overcome global carbon and energy supply challenges. The solution provides an extremely attractive energy storage option that uses the sun or wind to make ice. The technology combines two technologies: ThermCOLD Thermal storage and the Co2ldCARBON Pure CO2 only refrigerant system.

ThermCOLD Thermal storage uses Eureka prize winning phase change materials to provide highly efficient and cost effective storage for businesses’ cooling requirements and overcomes the electricity grid’s demand management issues. The Co2ldCARBON Pure CO2 only refrigerant system operates without expensive and environmentally harmful synthetic refrigerants and delivers efficiencies that outcompete other technologies on the market.

‘Australia’s Energy and Carbon future is defined by decisions we make now. It’s a function of investing in the wealth of intellect and opportunity that is available to us in South Australia. It’s about taking ownership, showing leadership, and accepting the risks inherent in doing something new. These are the tenets upon which Glaciem Cooling Technologies has developed its cooling solutions and the reasons why we are so proud to be active members of the Carbon Neutral Adelaide Initiative.’

Rohan Wighton - Business Development Manager, Glaciem Cooling Technologies
Winner

JEFFRIES

International food waste and organics recycling leadership

Jeffries is responsible for operating one of the most advanced integrated organic recycling operations in the world. In 2009 Jeffries launched one of the first source separated commercial food organic recycling collection (FORC) services in the world. Based on strong partnerships with leading waste management organisations including Cleanaway, Suez and Veolia, Jeffries invested in a collection service which enabled enterprises within the City of Adelaide and the greater Adelaide metropolitan area to recycle their food waste and organics, consequently reducing waste disposed to landfill. In FY2017, 1,800 tonnes of food waste and organics was diverted from landfill and recycled from the City of Adelaide. Additionally, in FY2017 Jeffries in partnership with the City of Adelaide recycled 635 tonnes of Kerbside Garden and Food Organics from households in the City and North Adelaide area. Combined this equated to over 1,078 tonnes CO2-e in FY2017. This reduction has been achieved whilst rapidly growing the business, increasing revenue from ‘start-up’ to a multi-million dollar activity within 10 years.

‘At Jeffries, we are passionate about creating value from organics through innovation.’

Lachlan Jeffries - Executive Director, Jeffries
Winner

SIMEC ZEN ENERGY

Smart energy storage helping businesses achieve real energy cost savings

A large portion of energy bill costs for many commercial and industrial users are due to costly peak demand charges. In most circumstances, businesses have little control over when they use electricity and their resulting peak demand charges, placing significant restrictions over how owners and managers can minimise the impact of rising energy costs.

SIMEC ZEN Energy is internationally recognised for partnering to promote and expand renewable energy and energy storage in South Australia. The demonstration of smart energy storage across the SA Art Gallery, Adelaide High School, SA State Library, and City of Adelaide Works Depot shows how businesses can combine large amounts of stored energy with smart technology that optimises how the stored energy is used, and provides the potential to use their own stored energy instead of the grid at times of peak demand. These ‘peak saving’ events give businesses complete control over their electricity usage needs from their retailer, lowering their peak demand charges and providing real relief from escalating energy costs.

‘SIMEC ZEN Energy is proud to deliver world leading smart energy storage systems for the State Government and the City of Adelaide, and assisting the efforts of Carbon Neutral Adelaide. Smart energy storage opens up opportunities for businesses to reduce their energy costs and improve competitiveness. With over 10 years experience helping businesses realise their renewable energy potential, we welcome the chance to demonstrate this smart energy storage pathway with partners like the State Government and City of Adelaide.’

Richard Turner - ZEN Energy Founder and SIMEC ZEN Energy Director of Innovation.
Leading the Growth of Australia’s Cleantech Sector

Through Australian CleanTech and other activities, John O’Brien has driven the growth of Australia’s cleantech sector. He has delivered over 100 events with 10,000 attendees and 350 cleantech company pitches, founded the Australian Cleantech Cluster, mentored 200 cleantech companies to achieve commercial success and provided advisory services to local, state and national governments on how to effectively grow the sector. He has assisted export growth for Australian cleantech companies to Asia, Europe and Latin America and provided thought leadership through numerous articles, two books and the Australian CleanTech Index.

‘The cleantech sector will provide the industries and jobs of the future and it has been a privilege to work for over ten years with so many amazing companies that are delivering both economic and environmental benefits for their communities.’

John O’Brien – Managing Director, Australian CleanTech
AZZO has installed a cutting-edge energy monitoring and demand management system across the majority of the City of Adelaide assets, including the Town Hall, the Adelaide Central Market, office buildings, UPark carparks, traffic lights, park lighting and data centres. This system provides more comprehensive cover and analysis of energy use than ever possible before. It has been incredibly valuable for the City of Adelaide during their journey towards carbon neutrality, as it has given them the ability to understand and see their energy use in a way that allows them to effectively manage it, without which it would be impossible for them to eliminate waste, drive down energy usage, or make improvements. This installation has resulted in energy savings ranging from 22% to 46% across the sites.

‘A comprehensive energy management system is the foundation for understanding energy use and empowers users to make significant reductions in carbon emissions – the system provides actionable information for Carbon Neutral Adelaide pathways.’

John Azzollini - Managing Director, AZZO
Buddy Ohm reduced energy by 44% in their Adelaide office

Buddy Platform’s Adelaide office was established in 2016, being centrally located and well fit out it was perfect for the growing technology company, however the 2016 energy costs were enormous. In response, a pre-launch ‘Internet of Things’ Buddy Ohm energy monitoring system was installed in early 2017 to benchmark energy use and identify savings.

The Buddy Ohm system allows a more granular and real-time understanding of how energy is being used. This meant immediate changes could be made to the office systems and behaviours, and the development of several business cases for energy efficient lighting improvements and applications. Buddy Platform’s Adelaide office is now on track to reduce annual energy consumption by 44% despite growth, more team members and increased energy prices.

‘Our service, Buddy Ohm, has helped us quickly and easily reduce our office energy consumption by 44%. As a business headquartered here in Adelaide, we’d love to support other South Australian businesses to take action to reduce their own energy consumption and carbon emissions. Commercial and residential apartment buildings contribute nearly 50% of our city’s carbon emissions, so let’s work together to tackle that issue!’

Adam Schultz - General Manager, Australia and VP Business Development, Buddy
Cool or Cosy has invested heavily in South Australia, acquiring Tindo Solar to become the only South Australian company manufacturing high-quality solar panels designed specifically for the local market. Cool or Cosy embraces the opportunities presented by solar for both the company and for the community. Cool or Cosy has helped many South Australians reduce their power bills and carbon footprint, with more than 11,500 residential and commercial systems installed. Within the City of Adelaide, Cool or Cosy has actively participated in the Solar Savers Adelaide program, working closely with the City of Adelaide to install solar systems incorporating locally manufactured Tindo panels on selected residences. Additionally, Cool or Cosy’s office has a 30kW system installed which has offset in excess of $85,000 in electricity costs. The TINDO site has a 100kW system which offsets about 50% of manufacturing costs. Both systems provide excellent examples to clients and show that Cool or Cosy has decoupled its business growth from carbon emissions.

‘At Cool or Cosy, we firmly believe in the goals of the Carbon Neutral Adelaide ambition. From the outset of our journey, we have worked tirelessly towards reducing South Australia’s carbon footprint by encouraging residents and business owners to embrace the benefits of insulation and solar – not only for themselves but also for the benefit of the community as a whole. Cool or Cosy has been promoting carbon neutral activities since our inception, well before the term ‘carbon reduction’ became relevant.’

Glenn Morelli – Managing Director, Cool or Cosy

Cool or Cosy
Total Energy Solutions
EST 1984

Making the City of Adelaide the world’s first carbon neutral City.
Cundall Adelaide - Reducing carbon through our business practices and our services

Everything we do relates to reducing emissions. We typically work with clients to help them become more sustainable. A by-product of this is significant carbon emissions savings. When we present a business case within our organisation or to clients, we clearly separate the emissions impact from growth and actively work with our clients to deliver outcomes which support the productivity of their operations whilst reducing carbon emissions.

Cundall has always recognised that we must practice what we preach and we are the first consultant to be endorsed globally as a One Planet Company.

For Cundall’s Adelaide office, the majority of our revenue is based on reducing the carbon impact of clients based in the Adelaide CBD. We have identified and helped implement savings in the order of 1,000,000 kg CO2-e p.a. for Adelaide CBD buildings. For our own offices, we relocated from a 4.5 star to a 5.5 star NABERS Energy tenancy and saved a total 495kg CO2-e p.a. (equating to 7kg/m2 p.a.) in our first year heading towards zero carbon.

‘Energy consumption in buildings is responsible for almost one quarter of Australia’s GHG emissions (and more if you include the embodied carbon in materials). We need a step change in how our cities use and generate energy and Cundall, as a One Planet Company, fully supports the City of Adelaide’s much needed political leadership to help deliver a low carbon future. A future of energy generation and energy storage connected via smart grids with demand controls and energy sharing to deliver a safe, clean, secure and affordable energy for everyone.’

David Clark - Partner, Cundall
An affordable zero-emissions short trip passenger transport service

We chose Adelaide as our founding City because we knew it had all the right ingredients to be a global leader in sustainability and liveability. We have built a transport service that is zero-emissions by design because we believe that public transport should be the most convenient, sustainable and affordable way to get around. It should be a service that is people focused and celebrates the importance of places and people through rich experiences and connections. At EcoCaddy we embody this philosophy in everything we do from the high-tech vehicles that make up our fleet, to the high quality service we deliver to our customers. For us, carbon neutrality is not an afterthought but forms the foundation of our product design as we look to innovate our business further.

‘EcoCaddy believes that the answer to making cities better – more sustainable, active, liveable and prosperous - lies with the way we choose to move within our cities. As a catalyst that moves cities towards a more sustainable and liveable future, EcoCaddy’s zero emissions transport service has completed more than 40,000 trips, travelled over 55,000 kms and saved 7.2 tonnes of carbon emissions to date.’

Daniels Langeberg – Founder, EcoCaddy
Finsbury Green – Sustainability and carbon neutrality is standard

Finsbury Green’s reputation as Australia’s premier green print and marketing services manager is unparalleled and since 2005 the company has been operationally carbon neutral. Finsbury Green offers a complete range of carbon neutral manufacturing including premedia, multichannel, e-publishing, digital and offset print, finishing and mailing solutions. All activities are undertaken with the environment in mind, ensuring sustainable practices throughout the supply chain and resource efficiencies. Finsbury Green has been recognised with 11 environmental awards and continues to lead industry in sustainable practices.

‘Finsbury Green actively pursues a policy of alleviating environmental impacts by adopting green technologies, eco-advantaged products and processes and has been responsible for industry pioneering environmental practice since 2002. We believe that by supporting Carbon Neutral Adelaide, greater outcomes will be achieved in our collective pursuit of reducing carbon and making our city carbon neutral.’

Peter Orel – Chief Executive Officer, Finsbury Green
Journey to Energy Efficiency and Greenhouse Gas Emission Abatement

91 King William Street (Westpac House) has undertaken significant base building energy efficiency and greenhouse gas emission abatement initiatives since 2007. This has resulted in an increased NABERS Energy rating from 2.0 Star (2007) to 4.5 Star (2017) and a saving in greenhouse emissions (Full Fuel Cycle - scope 1, 2 and 3) to the atmosphere of 776.15 tonnes CO2-e p.a. (2017 saving). These savings are underpinned by Knight Frank SA’s Sustainability Working Group which fosters, encourages and promotes energy efficiency and greenhouse gas abatement across all staff. Knight Frank is committed to assisting clients to achieve and exceed their environmental goals and objectives with 7 core Sustainability Commitments and walk the talk by ensuring offices implement advocated actions. This was recognised in 2015 by winning the SA CitySwitch Partner of the Year Award (under 2000m²).

‘Knight Frank is determined to achieve improved environmental performance by controlling our impact on the environment through more sustainable operations. In managing a wide variety of office, industrial and retail properties, we can have a positive influence by working with our clients and service providers to further reduce carbon emissions through efficient operations and capital improvements.’

Nick Mavropsi, Senior Director,
Head of Sustainability, Knight Frank Australia
Finalists

NEW NORMAL

An award for households or individuals who demonstrate an aspirational example of sustainable low carbon or carbon neutral living that others could follow and whose choices are contributing to City of Adelaide carbon emissions reductions.

Natalia - North Adelaide
Natalia is a retiree living in a heritage listed building surrounded by extensive gardens in North Adelaide. With the help of the Sustainability Incentives Scheme, she installed rainwater tanks capable of storing 44,000 litres and a 11.6kw Solar Panel system with battery. Natalia reduces her energy consumption with solar panels and LED lighting, as well as external shading to regulate the temperature of her home. Recycling materials, composting, walking and using public transport are all normal activities in her conscious lifestyle.

Anthony & Anna - North Adelaide
This family of four enjoy all the mod-cons of modern life in a renovated CBD heritage house with 95% electricity self-sufficiency. Through the help of the Sustainability Incentives Scheme, they installed a 4.7kW solar system linked to a Tesla Powerwall 2 battery storage system. They store and reuse rainwater and save energy with LED lighting. During their renovation, they reused building materials, incorporated skylights for natural daylighting and designed the extension for passive temperature control.

Nick Graalman - Happy Valley
Nick Graalman’s household is very environmentally conscious. They operate their business from a home office run entirely on solar power, from which they service clients in the City of Adelaide. They utilise energy efficient LED lighting, recycle everything (producing only 2kg of waste annually), purchase second-hand goods, operate a paperless business and sponsor green projects.

Eric & Bronwyn - North Adelaide
Eric & Bronwyn are retirees who were the first in their area to install integrated solar panel and battery system. They chose to install a 10.2kW solar panel system with a 7.5kW battery with assistance from the City of Adelaide’s Sustainability Incentives Scheme. This decreased greenhouse gas emissions from 2.2 tonnes to 0.8 tonnes per quarter in their home. The carbon footprint of their lifestyle is kept low by supporting their community through shopping and living locally.

Adam Tomlinson - Golden Grove
Adam studies in the City of Adelaide, commuting by bicycle daily, completing over 250km per week. His household practices recycling, frugal use of resources, buying preloved clothing, supporting local producers, community engagement and advocacy.
OzHarvest was founded to address two fundamental societal challenges - the staggering waste of quality excess food, and the growing need for food relief for vulnerable people. OzHarvest SA have been operating for over 6 years and have made a tremendous impact on the environment and the community. Since their inception, they have rescued over 2 million kilograms of quality excess food from going to landfill, which is the equivalent of diverting over 3.2 million kilograms of carbon emissions. Each month across Adelaide OzHarvest collect 50 tonnes of good food and delivers it to more than 130 charitable organisations who feed people in need. OzHarvest is also a leading changemaker in this space and educates the wider community and industry about the impacts of food waste on the environment through education and engagement programs and events including NEST, Nourish, Cooking for a Cause, Think.Eat.Save and the Great Food Rescue Race.

OzHarvest are committed to reducing carbon emissions by diverting surplus food from landfill and delivering it to charitable agencies who feed people in need. Food waste is a $20 billion problem for the Australian economy with more than 4 million tonnes wasted every year. Up to one third of all food during production goes to waste whilst in our homes we are putting 1 in 5 shopping bags in the bin. OzHarvest is passionate about making a significant positive environmental and social impact and are very proud to join Carbon Neutral Adelaide in their vision, and specifically to advocate alongside them in the area of Waste Reduction.

Kristian Nesbitt - State Manager, OzHarvest
Siemens undertook a study outlining key technologies that could support Adelaide in becoming the world’s first carbon neutral city and in the process potentially generate thousands of full time jobs. The report handed over by Dr Roland Busch, member of the Managing Board of Siemens AG, in September 2016 showed that cutting emissions by about 56% over the next decade in the City of Adelaide has the equivalent gross employment opportunities of 23,000 full time jobs in installation, operation and maintenance jobs in low carbon energy, public transport mobility and building systems.

The study used Siemens’ proprietary model, the City Performance Tool, to evaluate over 700 data inputs from the population, transportation networks, commercial and residential buildings, energy networks and over 70 technologies currently being used in Adelaide. It provided city managers and planners a unique view of the City and helped identify areas of greatest need and effectiveness for better resource allocation. Reports such as this highlight Siemens’ influence as the World’s most Sustainable Company (Forbes 2017).

‘Siemens has a long and proud history in South Australia. We helped transform South Australia with the telegraph line 144 years ago. We’ve continued a great technology partnership and now we’re proud to help Adelaide transition to the world’s first carbon neutral city. Adelaide joins leading cities such as San Francisco, Vienna, Copenhagen and London in adopting a holistic approach for prioritising future infrastructure needs based on its long-term economic and environmental goals.’

Dr Roland Busch – Board Member, Siemens AG
Embracing the early application of sustainable technology, Thomson Rossi was instrumental in seeking dispensation from the National Construction Code for clean saltwater battery storage. Previously, all other storage systems were chemically based, requiring fireproofing under the Code which created complexities for installation. The new technology, called the Aquion hybrid ion deep cycle battery, consists of saltwater, carbon and cotton which can be recycled at the end of its life. Thomson Rossi challenged the requirement for fire-rating around this benign battery system, with proper investigation now making it possible for this type of battery storage to become an economic solution by negating the requirement for fire-rating adjoining structures. The installation of this system now allows Thomson Rossi to store the excess energy generated from the 30kW PV system, saving 126.7 tonnes CO2-e and deriving monetary benefit. By setting this example, Thomson Rossi hopes to share this knowledge with clients and others.

‘As architects, we have a unique opportunity to influence sustainable outcomes in an industry that contributes significantly to the use of natural resources. Driven by consideration of people, environment and life cycle costs, we have proven sustainability and commercial pragmatism can co-exist. There is also the potential for far reaching social change in our understanding of the relationship between people and the environment. Supporting Carbon Neutral Adelaide helps us pursue a positive approach to design, fostering collaboration, open-mindedness and integration.’

Simon Thomson – Director, Thomson Rossi Associates
For more information on the Carbon Neutral Adelaide Partners Program visit www.carbonneutraladelaide.com.au