



RESILIENT MELBOURNE DELIVERY OFFICE ANNUAL REPORT

2018-19

Accessible version

Resilient Melbourne acknowledges the Traditional Custodians of the Land, and their strength, resilience and pride as the oldest continuous culture in the world.

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Foreword

The Resilient Melbourne Steering Committee supports Resilient Melbourne's efforts by guiding progress against the long-term objectives and actions set out in the Resilient Melbourne strategy, Australia's first urban resilience strategy.

The end of 2018–19 completes the third year of the Resilient Melbourne Delivery Office (Resilient Melbourne) and of strategy implementation. We are proud to commend this third annual report, which demonstrates the breadth and depth of transformation Resilient Melbourne is aspiring to and driving. In an increasingly complex world, Resilient Melbourne is proactively building capacity of practitioners and leaders to better understand the interconnection between acute shocks and chronic stresses, their potential and ensuing impact on our city. This report outlines the status of strategy actions, many of which are now delivered, and reports against progress indicators.

Significantly, 2018–19 saw the launch of *Living Melbourne: our metropolitan urban forest*, the first metropolitan urban forest strategy in Australia and perhaps the world. More than 150 partners came together to celebrate *Living Melbourne* and all of the work behind the strategic and compelling business case to connect, extend and improve greening efforts across Melbourne. The strategy was formally endorsed by 41 organisations that have committed to its vision, goals and actions, and to work in partnership to implement them. Through *Living Melbourne*, Resilient Melbourne has once again demonstrated its ability to foster multi-sectoral collaboration for the benefit of our communities.

The Delivery Office is set up with a five-year sunset clause based on a funding agreement signed with the Victorian Government. Resilient Melbourne commissioned a report by Ernst & Young, to explore future operating and finance model options to build on Resilient Melbourne's strengths and to be financially sustainable into the future. Many of Resilient Melbourne's key stakeholders informed the report and work will continue through 2019-2020 to have in place a new model by the end of the year.

100 Resilient Cities—Pioneered by The Rockefeller Foundation is going through a similar transition. Over the six years since its establishment in 2013, more than 70 cities around the world have published resilience strategies and nearly 80% of them have institutionalised the role of Chief Resilience Officer. At the Urban Resilience Summit in July 2019, the Rockefeller Foundation announced that it is providing an \$8 million transition fund to 100 Resilient Cities to evolve the 100RC initiative to become a more city-driven network.

We are pleased to see the continued investment in this important global program, which brings an integrated lens to the urban challenges we face, and we are thrilled that Melbourne is consistently recognised as a resilience leader in innovation and collaboration. We trust that this annual report inspires your continued work with Resilient Melbourne.

The Resilient Melbourne Steering Committee as of 2018/19

Steve Booth, Director, Metropolitan Economic Development, Department Economic Development Jobs Transport Resources

Andrew Crisp, Emergency Management Commissioner, Emergency Management Victoria

Mark Duckworth, Executive Director Emergency Management, Department of Economic Development, Jobs, Transport and Resources

Noelene Duff, Chief Executive Officer, City of Whitehorse [Eastern Region]

Stephen Wall, Chief Executive Officer, Maribyrnong City Council, Council [Western Region]

Graeme Emonson, Executive Director, Local Government Victoria

Maree Grenfell, Deputy Chief Resilience Officer, Resilient Melbourne [Secretary]

Toby Kent, Chief Resilience Officer, Resilient Melbourne

Rebecca McKenzie, Chief Executive Officer, Glen Eira City Council [Inner South Eastern Region]

Simon McMillan, Chief Executive Officer, Banyule City Council [Northern Region]

Anna Parle, Chief Resilience Officer and Director of the Community Resilience and Social Inclusion Branch ,
Department of Premier and Cabinet

Glenn Patterson, Chief Executive Officer, City of Casey [South East region]

Vijaya Vaidyanath, Chief Executive Officer, City of Yarra, [Inner region]

Linda Weatherson, Director City Operations, City of Melbourne [Chair]

Standing observers:

Professor Lars Coenen , Chair in City Resilience, University of Melbourne

Sam Kernaghan, Managing Director, 100 Resilient Cities Asia Pacific

Executive Summary

Resilient Melbourne exists to embed resilience practice across Melbourne's various levels of government in ways that resonate with our diverse communities. To do this, we coordinate the implementation of Actions in the Resilient Melbourne strategy, collaborating with a variety of stakeholders and industry partners. Our office embodies and demonstrates resilience qualities in how we approach our work, including working in new and innovative ways to achieve the best outcomes.

Resilience is a frame to understand the 'immune system' of the city. Urban resilience has many drivers, and the ability to understand how our systems interact, are interdependent and interconnect is fundamental to know where we are strong, weak and where there is opportunity to improve or additional support required.

Resilient Melbourne facilitates cross-sector collaboration between organisations that have the ability to influence Melbourne's resilience to complex urban challenges. We are well placed to play this role and we understand the value of this function from our many partners. An integrated perspective and being able to join the dots between the many moving parts of our urban systems is a key strength of Resilient Melbourne.

The past year has been one of deepening and extending partnerships. As such, our ability to leverage in-kind and financial support for Melbourne is growing. In addition to the \$1,060,011 we received as income to run the Delivery Office in 2018–19, we leveraged the equivalent of \$1,045,000 to support our partners and their work with Melbourne's diverse communities, beyond the direct activities of our own team. We sincerely appreciate the efforts of everyone who has worked with and supported us in achieving our outcomes during the past year.

Our training program, Resilience Fundamentals, has its own momentum, with full sessions being delivered every two months. In total, over 300 people have been trained, including 102 in 2018-2019. Over the life of the Delivery Office, through training and speaking engagements, we have built the capacity of over 3500 people from multiple sectors to better understand and apply concepts of resilience. During 2018–19, we delivered 59 workshops and speaking engagements. We partnered with 100 Resilient Cities Platform Partner Jacobs to deliver a sell-out, three-part speaking series, Emerging Technologies for Resilient Cities, to hear from global and local leaders on issues from housing for the homeless to climate adaptation to innovative transport. Working with others, we have brought resilience experts such as Professor Daniel Aldrich to Melbourne to deepen our shared understanding of disaster resilience.

The 2018–19 financial year saw us reach many strategy implementation milestones as we delivered against our commitments. The support for and launch of our flagship action *Living Melbourne: our metropolitan urban forest* on World Environment Day (5 June 2019) was a significant achievement, receiving the Australian Institute Landscape Architects President Award and international acclaim. Our five *Resilient Communities* projects are well underway and some of the research projects also initiated. This includes working with the Victorian Government's Department of Environment, Land, Water and Planning on their 20-Minute Neighbourhoods program, an effort to see communities able to meet all their daily needs within a 20-minute walk, cycle, or trip on public transport. The Resilient Communities action is enhancing our understanding of the relationship between participatory development, social cohesion and community resilience to influence future residential developments.

The five-year trajectory of the Resilient Melbourne Delivery Office

This image is an S curve diagram which represents Resilient Melbourne's trajectory over its five year operating timeline. This is divided into three time periods with an orange circle which marks Resilient Melbourne's current status along this five year timeframe. The three time periods noted in the trajectory are:

Year 1: RMDO establishment

Year 2-3: Accelerated Action Delivery

Year 4-5: Focus on embedding

The orange circle is positioned midway between the year 2-3 and year 4-5 point of the S curve.

The metropolitan cycling network Action has a vision to make metropolitan Melbourne the safest, most accessible cycling city in Australia. A cycling network model is being developed and delivered for the Inner Melbourne Action Plan region as a pilot that will have the ability to be scaled for the wider metropolitan region. IMAP consists of the metropolitan Melbourne cities of Maribyrnong, Melbourne, Port Phillip, Stonnington, and Yarra.

There is much more to find out about in this report. We encourage you to read it, share it across your networks, and see how you can be involved in this story. Resilient Melbourne is honoured to support the institutions and organisations that help enhance the resilience of our communities. We are proud of how Melbourne is steadily becoming more prepared and better able to respond to a wide range of challenges, working together, today for a better tomorrow.

Role of the delivery office

Our vision: In a resilient Melbourne, our diverse communities are viable, sustainable, liveable and prosperous.

Who we are

The Resilient Melbourne Delivery Office launched in July 2016. Although housed by the City of Melbourne, the Delivery Office is ultimately accountable to all 32 metropolitan councils. Core funding for Resilient Melbourne is sourced in three parts equally from the Victorian Government, City of Melbourne and other metropolitan councils over our five-year life span. Notably, this extends across two rounds of four-year Council Plan development (2017–21 and 2021–25). In developing the Resilient Melbourne strategy, we followed three guiding principles:

- The Resilient Melbourne Delivery Office exists to embed resilience practice across Melbourne’s various levels of government, in ways that resonate with our diverse communities.
- To do this, we coordinate the implementation of the actions in the Resilient Melbourne strategy, collaborating with a variety of stakeholders and industry partners.
- The Delivery Office embodies and demonstrates resilience qualities in how we approach our work, including working in new and innovative ways, being passionate about achieving positive outcomes.

These guiding principles now form the core of the Delivery Office’s four operating principles.

Our operating principles

- We build on existing structures.
- We reduce duplication of effort.
- We support the delivery of tangible benefits for Melbourne’s communities today, with the long term in mind.
- We have five short years to make this work stick!

How we work

- We coordinate, facilitate and drive collaboration.
- We foster innovation and trial new ways of working.
- We galvanise resources, including attracting new financing.
- We assist local government and others to develop resilience-building capabilities.
- We amplify the efforts of others to achieve more with existing resources, including through knowledge brokering.

100 Resilient Cities network

Sam Kernaghan – Managing Director, Asia Pacific – 100 Resilient Cities

In six years, the 100 Resilient Cities (100RC) initiative has grown from an idea to a movement. Together, as a community of chief resilience officers, city leaders, and private-sector and not-for-profit partners, we have shaped how the world understands the opportunities to build resilience.

Our work has evolved and matured over the years, but our focus has remained steady: to help cities create the enabling environment that makes it possible for them to transform how they plan and act to prepare for their most pressing challenges.

We could see the impact of that work, our journey to date, and the urban resilience movement as the 2019 Urban Resilience Summit in July brought together more than 400 practitioners and city leaders across the full 100RC network for the fourth time in Rotterdam. Lessons learnt from across the network have been captured in a comprehensive report, [Resilient Cities, Resilient Lives](#).

Through the first phase of 100 Resilient Cities, we laid the groundwork for a global movement to take hold. On 8 July 2019, The Rockefeller Foundation announced an \$8 million commitment to continue supporting the work of chief resilience officers and member cities within the 100RC network.

This new funding will enable a new project to continue supporting the growth of the network and the implementation of resilience initiatives incubated to date. As cities continue to turn to each other to share best practices, solve problems collectively and extend peer-to-peer support, the work will continue.

We are taking stock of this progress along four principal pathways:

- **Building champions:** 83% of member cities have institutionalised the position of Chief Resilience Officer and other cities are following this lead.
- **Taking action:** More than 80 resilience strategies will have been published by the end of 2019, containing more than 4000 actions and initiatives targeted at improving urban resilience.
- **Forming partnerships:** More than 1400 intercity collaborations have come to life regionally and globally, often bringing the power of the private sector to create multi-benefit solutions.
- **Funding resilience:** Member cities have leveraged over \$25 billion for project implementation

Resilient Melbourne Highlights 2018-19

This image is a graphic timeline of highlights for Resilient Melbourne across the 2018-19 Financial Year.

See figure 1 for detailed information the highlights across the 2018-19 Financial Year.

Figure 1: Resilient Melbourne Highlights 2018-19

Month & year	Wording
August 2018	<p>Discussion On Social Resilience Hosted At State Library Victoria With Daniel Aldrich</p> <p>Resilient Melbourne, in partnership with the Catalyst Network, hosted an event exploring social capital's critical role in post-disaster resilience and recovery with Professor Daniel Aldrich, Director of Boston's Northeastern University Security and Resilience Program, along with a panel of local experts to discuss global and local contexts.</p>
August 2018	<p>OPEN INNOVATION CHALLENGE GUIDE FOR LOCAL GOVERNMENT RELEASED</p> <p>Following the successful completion of the Citymart Challenge, we worked with the City of Melbourne's Smart City Office to publish a how-to guide for local government about how to successfully run an Open Innovation Challenge.</p>
September 2018	<p>PARTNERSHIP WITH JACOBS ON EMERGING TECHNOLOGIES FOR RESILIENT CITIES</p> <p>We partnered with engineering group Jacobs, focused around our action areas of Adapt, Survive and Thrive. Together, in a three-part series, we explored the role of emerging technologies to build greater resilience outcomes. We were joined by Jacobs' global leaders and local experts to discuss their work in 3D modelled housing, climate adaptation and transport systems, and their relevance in Melbourne.</p>
October 2018	<p>LGPRO RESILIENCE SPECIAL INTEREST GROUP LAUNCHED</p> <p>We were joined by local government practitioners and leaders from across metropolitan Melbourne to kick off the first LGPro Resilience Special Interest Group. The first session focused on Embed – how do we institutionalise resilience practice for long-term change? This was the first of four events exploring the role of resilience thinking in strengthening local governments' ability to deliver to communities in Victoria.</p>
October 2018	<p>MELBOURNE APARTMENTS PROJECT REPORT RELEASED</p> <p>A final report on one of our Actions, the new apartments trial for public housing residents (Melbourne Apartments Project), explored implications of existing policy for public and social housing residents. It considered how this initiative has helped to generate pathways to affordable home ownership in Melbourne. The model is now led by the Barnett Foundation.</p>

Month & year	Wording
October 2018	<p>ARTS HOUSE EVENT REFUGE 2018: PANDEMIC</p> <p>We joined Arts House in the third instalment of Refuge 2018: Pandemic, a four-day interactive disaster scenario. We explored how art, through play and creative disaster scenario planning, can best help communities cope and thrive in times of disaster.</p>
November 2018	<p>BUILDING RESILIENCE WITH NATURE: A PRACTITIONER'S GUIDE TO ACTION RELEASED</p> <p>We worked with 100 Resilient Cities and Earth Economics to publish a guide about building greater resilience outcomes with nature. The report explores nature-based solutions that can help address the shocks and stresses cities will face in the future.</p>
December 2018	<p>PLAN MELBOURNE'S 20-MINUTE NEIGHBOURHOODS PILOT PROGRAM ANNOUNCED</p> <p>Two of our Resilient Communities sites were announced as pilots as part of the Department of Environment, Land, Water and Planning's 20-Minute Neighbourhoods initiative to help Melburnians live more locally.</p>
January 2019	<p>INNER MELBOURNE BICYCLE NETWORK MODEL FUNDING CONFIRMED</p> <p>We are working with the Inner Melbourne Action Plan councils to create a network model of existing and potential cycling routes, considering socio-economic, safety and other factors. This is a critical first step in support of our plan to create a complete metropolitan cycling network, a flagship action in the Resilient Melbourne strategy.</p>
February 2019	<p>LGPRO RESILIENCE SPECIAL INTEREST GROUP – APPROACHES TO ADAPTING</p> <p>Practitioners from across Victoria came together to hear about why adapting is a fundamental part of improving our resilience to urban challenges and to share successful approaches. We heard from CoDesign Studio on The Neighbourhood Project, Associate Professor Lauren Rickards from RMIT University, Noelene Duff CEO of City of Whitehorse, and Martin Hartigan from The Nature Conservancy Australia.</p>
June 2019	<p>LIVING MELBOURNE LAUNCHED ON WORLD ENVIRONMENT DAY</p> <p>We were joined by leaders and resilience practitioners from across Melbourne and Victoria to launch Living Melbourne: our metropolitan urban forest. Endorsed by 41 organisations, Living Melbourne works to connect, expand and improve existing greening efforts to help us address a wide and growing range of shocks and stresses across Melbourne.</p>

Value and impact of Resilient Melbourne

Resilient Melbourne facilitates and fosters networks and galvanises people and organisations with ideas, action and opportunities. We quantify and evaluate our impacts wherever possible, but tracking the seeds we plant, and those that germinate, is a complex task. It is also ambitious to know what impact we have had on Melbourne's overall resilience given the multiple variables involved. This section describes how we measure, evaluate and report on Melbourne's resilience and implementation progress over time and overviews our outputs for 2018–19.

Understanding Melbourne's Overall Resilience

We have participated in and piloted approaches to better understand and measure Melbourne's changing resilience.

Resilient Melbourne convened a multi-sector community of practice to trial the 100RC City Resilience Index, a resilience index and tool developed by Arup. Data collection across tiers of governments and departments proved complex. The resources required to collect this data was deemed unsustainable for producing regular reports on Melbourne's resilience narrative at this moment in time. However, it was a useful exercise in better understanding the scale and diversity of metropolitan Melbourne. We continue to be involved in discussions about future resilience indicators locally, nationally and across the Asia–Pacific region.

Resilient Melbourne Progress Reporting

We have developed various processes to assist us in reporting regularly to the Resilient Melbourne Steering Committee and leaders across metropolitan Melbourne. This includes reporting to all metropolitan council chief executive officers every second month and the Resilient Melbourne Steering Committee about Resilient Melbourne activities, strategy action implementation, communications activities and events, quarterly.

In addition to this we collate data against progress indicators, which are reported in the annual report (see page 15).

Value and Impact Findings

Three significant pieces of work in 2018–19 have contributed to qualified findings on the Resilient Melbourne Delivery Office's value and impact.

Ernst & Young review

An independent review of the Delivery Office was completed by Ernst & Young to assess and provide recommendations for a future operating and financing model. Part of this review was to understand the value of the Delivery Office to our stakeholders.

The review consisted of:

1. an examination of existing strategies, project outputs and information generated to assess the existing operating model
2. research including interviews with representatives from local and state government, academic and private sector, who were identified as key stakeholders to Resilient Melbourne
3. a broader stakeholder survey, seeking feedback on Resilient Melbourne's value and impact and future models of operation. The survey received 70 responses representing state and local government, universities and the private sector.

Some key themes of demonstrable value derived from Resilient Melbourne were identified.

Convening and facilitating people, networks and organisations

The Ernst & Young report acknowledges that Resilient Melbourne brings together diverse stakeholders, including local and state government, Melbourne's 32 metropolitan councils, the private sector and other actors around complex resilience challenges. This is a distinct and unique role not fulfilled by any other single organisation in metropolitan Melbourne.

Resilient Melbourne joins the dots between individuals and organisations working on different aspects of resilience in various sectors. This occurs strategically through the design of project steering and working groups, opening Resilience Fundamentals training to a number of sectors, through resilience workshops and events and as part of formalised peer-to-peer network streams such as the LGPro Resilience Special Interest Group.

Capacity building

Resilient Melbourne hosts a suite of training opportunities for resilience practitioners in Melbourne, Australia and globally as well as participating as a presenter in relevant forums and conferences. Resilient Melbourne's training, Resilience Fundamentals, is an introduction to the theory of urban resilience, resilience frameworks, and the interconnection between acute shocks and chronic stresses. Held every second month, the training helps participants to apply tools and resources to practice thinking using a resilience perspective, and encourages the design of projects to achieve greater collaboration, resilience outcomes and efficiencies of scale.

Delivering strategy actions

The Resilient Melbourne strategy provides a platform for multi-sector collaboration on issues that span the entire metropolitan region. One notable example has been the *Living Melbourne* strategy, which built on existing work from a variety of local and state government actors where no metropolitan governance exists to date.

Access to a global network

As part of the global 100RC network, Resilient Melbourne connects stakeholders in Melbourne to knowledge, case studies, finance-leveraging opportunities and lessons learnt. Resilient Melbourne has fostered connections to benefit Melbourne both locally and globally. For example, in 2018–19 we connected City of Melbourne and Melbourne City Mission with New York City and London on homelessness programs, New Orleans and Melbourne on resilience precinct planning for Fisherman's Bend, Milan and Melbourne on the urban forest, Southern California and Victoria on community-based emergency management, and Vancouver and Melbourne on disaster resilience and creative arts. Melbourne is consistently identified as a global leader on resilience innovation, institutionalisation and leadership.

We have brought resilience experts to Melbourne such as Chief Resilience Officers from Boulder, Durban, New Orleans and Semarang for a three day knowledge exchange on the role of nature in supporting urban resilience. As a result of this exchange, *Building Urban Resilience with Nature: a practitioner's guide to action* was published in 2018 in partnership with 100 Resilient Cities and Earth Economics. In 2018–19, we facilitated cross-discipline conversations between three global resilience leaders and local experts as part of the Emerging Technologies for Resilient Cities speaker series with 100RC Platform Partners Jacobs.

Chair in Resilient Cities research

Hosted by The University of Melbourne, the Chair in Resilient Cities plays a critical role to deliver action-based research on Resilient Melbourne's approach, work and governance. Resilient Melbourne has been a test bed for new ideas and ways of working, and the Chair in Resilient Cities has applied various research methodologies in developing publications to capture lessons learnt.

One of the papers developed by the Chair, *Urban Resilience in Action: the Resilient Melbourne strategy as transformative urban innovation policy*, discusses the role of the Resilient Melbourne Delivery Office as a change agent in urban innovation policy. It identifies the actions as pilot projects – not only as they relate to

new technology or infrastructure but also as new approaches to improve social relations, policy making and planning. The research found that the Actions from the Resilient Melbourne strategy are vital tests for existing forms of governance, particularly in areas where existing urban planning, policy and practice depend heavily on traditional and sometimes outdated practice.

Resilient Melbourne is described as a facilitator, moderator and platform for knowledge exchange between local and state government authorities, private-sector, non-governmental organisations and academia. The open and self-reflective nature of actions is helpful to 'break down silos and leads to inter-sectoral thinking', as a representative of a local government authority explained. Another representative described the novel processes of learning between geographically distant local councils, which usually do not cooperate through projects.

The paper also identified Resilient Melbourne as an important and valuable practice in learning lessons from what hasn't worked as an 'experimental' set of programs and guidelines that governments, both local and state, can learn from.

Urban Institute research

Resilient Melbourne was selected to participate in a research project undertaken by the US-based Urban Institute with stringent selection criteria to which the 100RC leadership had to comply when identifying pilots.

One criterion was that the initiative had to have a strong likelihood of completion. A small handful of projects were selected for this pilot and *Living Melbourne: our metropolitan urban forest* was one of them. Preliminary results from interviews indicate that *Living Melbourne* will have extensive environmental, social and economic co-benefits. *Living Melbourne* may become a definitive model for co-benefit analysis (particularly regarding health and environmental system valuations). *Living Melbourne* poses a few distinct benefits. The key researcher comments in the preliminary findings that, "Confronting the fundamental challenge of interjurisdictional governance is one that will be a tremendous lesson for other 100RC member cities. Indeed, it could be a lesson for future environmental policymaking since environmental challenges reach beyond jurisdictional borders just as roots go past tree trunks."

Resilient Melbourne Outputs, 2018-19

Resilient Melbourne has developed, delivered and co-produced the following outputs in 2018-19:

- [*Building Urban Resilience with Nature: a practitioner's guide to action*](#)
- [*The Open Innovation Challenge: a how-to guide for local government*](#)
- [*Melbourne Apartments Project: from social housing to home ownership - Report 1*](#)
- [*Melbourne Apartments Project: from social housing to home ownership - Final report*](#)
- [Insure it. It's worth it toolkit](#)
- [*Living Melbourne: our metropolitan urban forest strategy and technical report*](#)
- [The Resilient Brimbank framework](#)
- [Integrated Water Management Information Hub – a website resource for practitioners.](#)

These resources aim to contribute to the growing practice of urban resilience, sharing our knowledge, experience and reflections. For more information on action outputs, see page 15. Individual action overviews begin on page 17.

Our insights into the Resilient Melbourne strategy actions indicate that urban resilience actions can be interpreted as a place-based urban innovation strategy. Several interviewed stakeholders involved in Resilient Melbourne Actions highlight the novelty of the way of urban governance, as it brings continually together a

wide range of stakeholders and follows consultation processes that integrate ideas and critique into the ongoing implementation.

Urban Resilience in Action: the Resilient Melbourne strategy as transformative urban innovation

Strategy Implementation

Snapshot of our third year

This graphic is titled: “Snapshot of our third year” and uses a series of three-dimensional bubbles, all of different sizes and colours to represent key notable achievements by the Resilient Melbourne Delivery Office across the 2018-19 Financial Year. See figure 2 for information on the specific wording of these achievements.

Figure 2: A snapshot of our third year

<p>102 Resilience fundamentals attendees</p> <p>45 organisation</p> <p>Capacity building of 1460 practitioners</p>
<p>35 media articles including:</p> <p>25 on <i>Living Melbourne</i></p> <p>13 print media features</p> <p>12 mentions in the media</p>
<p>9 intern placements</p> <p>203 days</p> <p>1504 hours</p>
<p>7 ACTIONS COMPLETED:</p> <ul style="list-style-type: none">• Community Resilience framework• Integrated water management• <i>Living Melbourne</i> (metropolitan urban forest strategy)• Citymart Challenge• Melbourne Apartments Project• Drivers of Community Resilience• Innovative business models
<p>178 hours spent browsing Resilient Melbourne website</p> <p>8573 website visitors</p> <p>5910 newsletter views</p> <p>145 new newsletter subscribers</p>
<p>11 papers</p> <p>13 presentations</p> <p>by Chair in Resilient Cities</p>

199,646 Twitter impressions
748 LinkedIn followers during 2018-19
241 New Twitter followers generated in a year: From 1559 (July 2018) To 1800 (July 2019)
7 ACTION OUTPUTS CREATED: <ul style="list-style-type: none"> • The Open Innovation Challenge: a how-to guide for local government • Melbourne Apartments Project report with Melbourne City Mission • <i>Living Melbourne</i> strategy • Integrated Water Management Information Hub • The Neighbourhood Project's <i>Neighbourhoods Made by Neighbours: a guide to community-led placemaking</i> • Report on lessons learnt from Melbourne Renewable Energy Project • <i>Insure it. It's worth it</i> toolkit – produced with Victorian Department of Health and Human Services and Good Shepherd Microfinance
59 EXTERNAL ENGAGEMENTS involving public, non-profit, and private organisations

Snapshot of indicative action implementation timelines and current delivery status

This image is a representation of the level of progress of the 18 Resilient Melbourne Strategy Actions. The Actions are represented as a list with a corresponding level of progress noted in a legend below the image. The levels of progress noted are:

1. Delivered / implementation in progress
2. In progress
3. Partially delivered, on hold
4. On hold

Figure 3 gives a more accurate and detailed representation of this image and the progress for the 18 Resilient Melbourne Strategy Actions as represented in the image.

Figure 3: Snapshot of indicative action implementation timeline and current delivery status

Resilient Melbourne Action	Current Action Status
Metropolitan urban forest strategy	Delivered / Implementation in progress
Integrated water management support	Delivered / Implementation in progress
The Neighbourhood Project	Delivered / Implementation in progress

Resilient Melbourne Action	Current Action Status
New apartments trial	Delivered / Implementation in progress
Local government renewables group purchasing	Delivered / Implementation in progress
EMV Community Resilience Framework	Delivered / Implementation in progress
Drivers of Community Resilience	Delivered / Implementation in progress
Community-based resilience compendium	Partially delivered, on hold
Innovative insurance	On hold
Metropolitan Cycling Network	In progress
Resilient Communities in Residential and Mixed-use developments	In progress
Citymart Challenge	Delivered / Implementation in progress
Young and Resilient Living Labs	Partially delivered, on hold
STEM Mentoring Melbourne	Partially delivered, on hold
Innovative business models	On hold
RMDO	In progress
Chair in Resilient Cities	In progress
Resilience Training for Local Government	In progress

Adapt - Reduce our exposure to future shocks and stresses

Living Melbourne (metropolitan urban forest strategy)

Extend and link existing urban greening, reforestation and nature initiatives across Melbourne to improve biodiversity, health and wellbeing and reduce our exposure to hazards such as heatwaves and flooding.

Delivery Office Scope	Coordinate with The Nature Conservancy – a 100RC Platform Partner – and other partners to develop a strategy and plan for creating a metropolitan-wide urban forest
Current Status	Delivered – implementation in progress
Delivery Office Contributions	<ul style="list-style-type: none"> • Convened multi-stakeholder workshops with The Nature Conservancy with attendance from Victorian Government departments and agencies, non-government authorities, academics and local government representatives from metropolitan Melbourne’s six sub regions, plus senior reference group meetings • Facilitated two rounds of stakeholder consultation including briefing stakeholders, maintaining feedback register, and documenting and integrating feedback into the final version of Living Melbourne • Finalised mapping of the Melbourne metropolitan urban forest • Attended Councillor briefings across Melbourne to assist with formal endorsement of Living Melbourne • Finalised the Living Melbourne: our metropolitan urban forest strategy, technical report and strategy overview • Coordinated endorsement of Living Melbourne from 41 organisations • Coordinated the Living Melbourne launch with partners on World Environment Day, 5 June 2019
Primary 2019–20 Target	Facilitate implementation activities

Nature responds to urban shocks and stresses and affects resilience across the urban landscape in many ways. Developing a metropolitan urban forest strategy is a flagship action from the Adapt action area of the Resilient Melbourne strategy. Focusing on the qualities of a forest, such as clean air and water, and rich biodiversity, this action aims to build resilience across the city through ecosystem services. These include cooling the city, reducing the impact of flooding, improving diversity of flora and fauna, increasing access to

nature for citizen health and wellbeing, and more. In partnership with The Nature Conservancy and many partners, we aim to connect, extend and improve the existing greening efforts across Melbourne.

The development and finalisation of [Living Melbourne: our metropolitan urban forest](#) was accelerated in 2018–19, culminating in its launch in June 2019. As an Australian first, Living Melbourne has galvanised support for a shared vision, mapped vegetation – correlated with heat and social vulnerability across the entire metropolitan area – and put forward the business case for six key actions.

Unprecedented for a metropolitan strategy, 41 organisations endorsed *Living Melbourne's* vision, goals and actions, including the majority of metropolitan councils, Victorian Government, statutory authorities, water authorities and industry bodies that have committed to working together in partnership towards implementation. So far, an additional seven industry implementation partners have come on board.

These include:

- Australian Institute of Landscape Architects (AILA)
- Clean Air and Urban Landscapes (CAUL) Hub
- CitiesWithNature – ICLEI Biodiversity Centre
- Earthwatch Institute
- Greater Metropolitan Cemeteries Trust
- Nursery and Garden Industry Victoria (NGIV)
- 202020 Vision

Progress and outcomes

To achieve broad buy-in and involvement in *Living Melbourne's* development and finalisation, we facilitated a series of workshops to receive technical input representing the diversity of metropolitan Melbourne and to understand priorities for action.

We conducted two rounds of consultation to seek feedback on *Living Melbourne* and were thrilled to receive 770 pieces of constructive feedback from individuals representing 65 organisations.

We sought formal endorsement from organisations representing those with strategic and operational influence across Melbourne, supporting this process with stakeholder and councillor briefings and a communications toolkit to assist with consistent messaging.

Living Melbourne was launched at the Melbourne Museum on World Environment Day (5 June 2019), and 150 partners, including mayors and CEOs, who enthusiastically signed their commitment to its vision.

A communications toolkit enabled all partners to promote *Living Melbourne* across many diverse networks, with good coverage through posts on social media, articles in newsletters and in local newspapers.

What's next?

In 2019–20, Resilient Melbourne and The Nature Conservancy will facilitate the development of a co-designed implementation plan with partners and facilitate implementation activities, whilst raising funding for *Living Melbourne's* actualisation

Integrated water management support

Enable better use of existing water systems to ensure healthy urban landscapes and waterways, and reduce our exposure to drought and flood by supporting the development and coordination of programs that adopt integrated water management and water-sensitive urban design principles.

Delivery Office Scope	Work with local government, the water sector, and government and research partners to support development and implementation of integrated water management solutions
Current Status	Delivered
Delivery Office Contributions	<ul style="list-style-type: none"> • Updated the Integrated Water Management Information Hub on our website as a central resource for local government and water sector stakeholders • Convened four meetings of the Integrated Water Management Support Working and Alignment Group to promote cross-organisation collaboration • Promoted the Victorian Government’s integrated water management forums • Completed a review of the Integrated Water Management Support Working and Alignment Group and found it was considered a critical group for sharing information and engagement across organisations.
Primary 2019–20 Target	<ul style="list-style-type: none"> • Establish the most effective way to maintain the Integrated Water Management Information Hub and increase its promotion, accordingly. • Work more closely with the Department of Environment, Land, Water and Planning IWM forums to better align activities, including to directly support implementation of Living Melbourne: our metropolitan urban forest.

Effective water management is essential for daily operations of our metropolitan city, relying heavily on the collaboration between a range of institutional stakeholders and local government and, increasingly, community members.

The Victorian Government launched a series of integrated water management forums in late 2017, to identify, prioritise and oversee the implementation of collaborative water opportunities. Resilient Melbourne has facilitated collaboration across the water sector (local and state governments, and water authorities) and collated integrated water management resources and tools in one place for the water sector to use.

Our specific role has been to convene the Integrated Water Management Support Working and Alignment Group, which provided a platform for leaders from critical water sector organisations to share updates and provide input on each other’s activities and priorities. A review of this group found that it was an essential component to enabling local government’s involvement and to improve communications across the sector.

Progress and outcomes

Given the actions of the Victorian Government and partners, the need for Resilient Melbourne to help drive action and fill gaps in activity has declined. We have therefore determined that our initial intent has largely been achieved, albeit that further work is required to make Melbourne truly ‘water secure’.

What's next?

Our current focus is on continuing to support communications about integrated water management, in particular through maintaining the Integrated Water Management Information Hub. We will continue to strengthen our relationship with the Department of Environment, Land, Water and Planning's metropolitan integrated water management forums and, as we implement *Living Melbourne* [(page 17)], this will be a critical element of achieving more integrated water management and greater vegetation across our growing metropolis.

The Neighbourhood Project

Help community groups and councils to transform under-used land around Melbourne into new local spaces for neighbourhoods to connect with each other.

Delivery Office Scope	Support and promote The Neighbourhood Project and its associated activities and apply lessons to other Resilient Melbourne strategy actions
Current Status	Delivered
Delivery Office Contributions	Supported and promoted the work completed for the second round of The Neighbourhood Project
Primary 2019–20 Target	Action is complete

The Neighbourhood Project is a three-year project run by CoDesign Studio in 2015–2018, funded by the Myer Foundation. The program aimed to engage communities to reimagine their underutilised spaces and catalyse long-term council process change in order to realise community benefits.

Progress and outcomes

In 2018–19, we saw the continued implementation of round 2 projects in five municipalities across Melbourne. These projects were selected for implementation based on their ability to mobilise community support. Resilient Melbourne provided training to successful applicants on resilience building and, as a result, the projects included a particular emphasis on social outcomes.

The five round 2 projects were Fawkner Food Bowls, Point Cook Pop-up Park, Edithvale Collective, Let's Make a Park Strathmore and Williams Landing Community Garden. More than 4280 volunteer hours were committed over four months by 25 community champions. Some stand-out achievements and outcomes include:

- 1500% increase in space usage – Fawkner Food Bowls
- 100% attendees met someone new – Fawkner Food Bowls
- approximately 50,00 visitors over the seven weeks – Point Cook Pop-up Park
- more than 5000 people attended a community mini-event – Edithvale Collective
- 93% increase in neighbourhood pride – Let's Make a Park Strathmore
- 100% youth led – Let's Make a Park Strathmore
- 95% increase in neighbourhood pride – Williams Landing Community Garden.

A key component of The Neighbourhood Project is sharing the lessons learnt during the program to grow the community-led placemaking movement. The Neighbourhood Project was featured at the LGPro Resilience Special Interest Group Adapt event, as a tangible project that can involve community in adaptive and inclusive activities. Resilient Melbourne is contributing to a series of resources, which will be made publicly available. These resources include:

- Neighbourhoods Made by Neighbours: a guide to community-led placemaking
- The Neighbourhood Project round 2 case studies
- A how-to guide and toolkit for council and community to implement community-led placemaking in their communities

What's next?

As The Neighbourhood Project closed, the project team worked hard to enable scaling of the project's impact through the development of a series of tools and resources for communities and councils. The hope is that, by seeing the work of other groups, community members will feel inspired to undertake a project in their neighbourhood, with a toolkit designed to walk them through the process from inception to implementation.

These are now available at <https://codesignstudio.com.au/>

New apartments trial for public housing residents (Melbourne Apartments Project)

Support efforts to replicate a new development that puts home ownership within reach of more social housing tenants.

Delivery Office Scope	Help build partnerships that enable new pathways to home ownership for social housing tenants and reduce waiting times for social housing
Current Status	Delivered
Delivery Office Contributions	Released a report summarising the Melbourne Apartments Project's model and facilitate opportunities to learn from the demonstration site and potentially replicate it
Primary 2019–20 Target	<ul style="list-style-type: none"> • Produce a report on lessons learnt from the Melbourne Apartments Project • Continue to explore opportunities for duplication and/or scaling

The lack of transitions out of social housing into home ownership is largely due to the lack of affordable and secure housing options available to low-income earners in Australia. At present, tenants often have little incentive or opportunity to move out of social housing. At June 2016, 42% of public housing tenants had lived in public housing for more than 10 years.

During 2018–19, Melbourne City Mission, City of Melbourne and Resilient Melbourne commissioned a final report to evaluate the Melbourne Apartments Project, a 34-unit apartment in North Melbourne. Melbourne Apartments Project and the scalable and replicable model, now known as the Barnett Model (see the Barnett Foundation <https://barnett.foundation>), is based on a deferred second mortgage model designed to support social housing tenants with adequate resources to transition into home ownership. The ([The Barnett Model: Evaluating the outcome and scalability of an affordable housing model](#)) report builds on the findings of an interim report ([Investigating the costs and benefits of the Melbourne Apartments Project](#)) released in June 2018 and provides:

- a summary of the cost–benefit analysis of government spending on social housing
- an outline of the Barnett financial structure and how it compares to government-supported financial structures encouraging home ownership for low-income households
- an assessment of the current housing policy settings aimed at encouraging and supporting home ownership by low-income households
- an investigation of the lived experience of the Melbourne Apartments Project residents to explore the motivations for a social housing tenant to be involved in projects that use the Barnett Model
- an assessment of the appropriateness of the Barnett Model to deliver a scalable, affordable home ownership option in Victoria.

Progress and outcomes

The Barnett Model represents an innovative approach to affordable home ownership options in an Australian context. This structure differs from the reliance on restricted rental income that is more common in social housing projects. The financial model is replicable, particularly if adopted by community housing providers. The model delivers sufficient cash flow to support an expanding portfolio of projects over time. This is predominantly as lump-sum payments from home purchasers, financed through mortgage loans from banks, allowing the developer to recoup the cost of developing the housing on settlement.

The final report concludes that the Barnett Model is both scalable and appropriate for a subsection of social housing tenants who are likely to benefit from the opportunity to transition into home ownership. The Melbourne Apartments Project supported 28 households, many of whom had lived in social housing for almost

30 years and were unlikely to move without this opportunity to achieve their goals of home ownership. Melbourne Apartments Project has illustrated that a project of this type is achievable without government subsidy if savings are achieved through different mechanisms (such as foregone profit, in-kind contributions from not-for-profit partners and tax concessions).

What's next?

Resilient Melbourne will continue to support the Barnett Foundation as it looks for opportunities to promote and scale the model.

Local government renewables group purchasing

Enable participating councils to procure renewable energy direct from new renewable energy projects, thus diversifying energy sources and shifting to cleaner technologies.

Delivery Office Scope	Follow the progress of new procurement projects by the Victorian Greenhouse Alliances and the City of Melbourne and partners
Current Status	Delivered
Delivery Office Contributions	A PhD candidate recruited from The University of Melbourne liaised with key stakeholders in Melbourne, conducted interviews and reviewed policy documents to produce a research-based report on the potential for local government collaboration in renewable energy procurement
Primary 2019–20 Target	<ul style="list-style-type: none">• Produce a report on lessons learnt from the Melbourne Renewable Energy Project pilot• Engage with key stakeholders in Melbourne pursuing the next iterations of group renewable energy purchasing

As end users, urban stakeholders have a key role in the transition to decarbonise the wider energy system. Large-scale renewable energy procurement is a complementary approach that bridges the gap between strategic climate goals and the limitations of local roof space for small-scale solar energy. Further, diversifying energy sources is an important part of building a new, hyperconnected yet devolved energy system.

When the Resilient Melbourne strategy was released in 2016, the Melbourne Renewable Energy Project – the first group renewable energy purchasing initiative in Australia – was in development. The Resilient Melbourne strategy anticipated that this pilot project would offer a tested model for other local governments to pool resources and procure renewable energy directly from a large-scale facility.

The Melbourne Renewable Energy Project was launched in 2017, and interest in the pilot project has effectively catalysed new collaborations among local governments and the private sector by sharing expertise as several new local projects have formed in Melbourne.

Progress and outcomes

The Resilient Melbourne Delivery Office has since taken a facilitative role in supporting group renewable energy procurement among Melbourne local governments by recruiting a PhD candidate, Paris Hadfield, from The University of Melbourne, and participating in working groups led by the Victorian Greenhouse Alliances, the City of Melbourne and partners.

In 2018, Resilient Melbourne released [Ms Hadfield's report](#) investigating the viability of group renewable power purchase agreements for metropolitan Melbourne councils. The report details the resilience benefits, implementation challenges and opportunities for expanding uptake of group renewable energy procurement in the local government sector. Based on in-depth interviews with a range of stakeholders and participants in the Melbourne Renewable Energy Project pilot, the report identified two emerging initiatives in Melbourne: a group-purchasing project for local government established by the Victorian Greenhouse Alliances, comprising local governments, and a second iteration of the Melbourne Renewable Energy Project for the private sector, led by the City of Melbourne.

The Local Government Power Purchase Agreement Project was established in 2018 to pursue renewable energy purchasing options for local governments across metropolitan Melbourne. Darebin City Council has since taken the lead on this project and, in October 2018, a group of 39 local governments formed a buyers group to undertake a business case for a renewable power purchase agreement, which was completed in May. The model involved participating councils nominating electricity contracts for council buildings or street lighting to be supplied by a regional renewable energy facility.

What's next?

The buyers group's current focus is to collectively establish a power purchase agreement for 100 per cent renewable energy supply. This approach offers co-benefits for economic development in regional Victoria through the construction of new large-scale renewable energy facilities.

The progress made by purchasing groups formed after the Melbourne Renewable Energy Project pilot demonstrated the viability of the direct purchasing model and the willingness of local councils to secure renewable energy supply. Resilient Melbourne aims to continue to support the progress of the local government renewable energy group-purchasing initiatives.

Survive - Withstand disruptions and bounce back better than before

The majority of our actions under the Survive action area were completed prior to the 2018–19 financial year (such as the Emergency Management Victoria Community Resilience framework for Victoria).

We continue to support the State Crisis and Resilience Council Risk and Resilience Subcommittee as well as working with many partners on related activities, including the Australian Institute for Disaster Resilience, Red Cross and the Victorian Council of Social Services. Here we highlight two notable activities from this year that were included within the original Resilient Melbourne strategy.

REFUGE

REFUGE is a five-year project led by Arts House Melbourne, bringing together diverse partners to explore new ways to rally as a community and prepare for climatic events.

REFUGE brings together people who might not normally collaborate in a crisis, including local residents, artists, scientists, Elders and experts from the world of emergency services. Their task is to identify what matters when the unthinkable becomes real: what being prepared means in the face of disaster, how the survival of the individual is inextricably bound up with the survival of community, and what role we can each play if the worst comes to pass.

Resilient Melbourne is a proud partner of REFUGE, contributing to each annual event and connecting key organisations for greater reach and contribution.

In 2016, we imagined a local flood and transformed the North Melbourne Town Hall into a relief centre for 24 hours.

In 2017, we envisaged the increasing possibility of five consecutive days with temperatures above 40°C.

In 2018, we examined a pandemic event and what happens when the risk of contagion means you would not bring people together.

For the next two years we are exploring displacement prompted by climate crisis and asking, 'what skills knowledge and relationships can ensure we are prepared?'

International opportunities

Two years ago, Resilient Melbourne and Resilient Vancouver connected over REFUGE.

Two years later and four days after releasing their resilience strategy, Resilient Vancouver, Resilient Melbourne and Jen Rae (a Melbourne artist from REFUGE and FairShareFare) came together to present a two-day Creative Lab in Vancouver. Bringing together Traditional Owners, artists, subject matter experts, emergency services, government and not-for-profit organisations, Creative Lab explored new and creative ways to prepare and engage the community in scenarios of future disasters. REFUGE was presented as a case study and idea, but not as a model to directly replicate. The intent was to provide a profound experience and explore what might be possible in Vancouver, in relation to its local context and specific shocks and stresses.

The 70 participants were immersed in rich knowledge, science, lived experience and stories and they put their minds to scenario planning with creativity at the core. The experience of Creative Lab was extremely generative. New connections were fostered, ideas were dreamed up and possibilities explored. Participants expressed genuine enthusiasm for developing the ideas and being involved in future projects.

Innovative insurance

Drive innovative approaches that make fit-for-purpose insurance affordable for more Melburnians, making more of our residents able to bounce back when unexpected shocks threaten their livelihoods and prosperity.

Delivery Office Scope	Work with councils and the insurance sector to identify activities and services that can support community resilience, beginning with Essentials by AAI, which offers basic house and car insurance to low-income households
Current Status	Partially delivered; on hold
Delivery Office Contributions	Worked with councils and the Victorian Department of Health and Human Services to identify ways to increase uptake of insurance among low-income households
Primary 2019–20 Target	Continue to promote the Insure it. It's worth it toolkit

Progress and outcomes

Resilient Melbourne continued to support and participate on the working group convened by the Victorian Department of Health and Human Services and Good Shepherd Microfinance to inform the design and delivery of a hard-copy toolkit for individuals to foster financial resilience in emergencies. The toolkit, *Insure it. It's worth it*, was released in September 2018.

The toolkit provides four easy steps to understand what level of insurance is needed in order to bounce back after an emergency:

- Know your risk.
- Calculate the value of your belongings.
- Insure what matters to you.
- Protect your important documents.

Building the capacity of our communities to better understand their risk and feel empowered to act is an important step in building our individual and collective resilience.

What's next?

Insure it. It's worth it is an important and user-friendly resource to assist preparedness to emergencies, which we will continue to promote.

Thrive – Significantly improve people’s quality of life

Metropolitan cycling network

Collaborate with Melbourne’s metropolitan councils, citizens and Victoria’s main transport bodies to establish a metropolitan bicycle path network and help make cycling a safer and more practical alternative to car travel.

Delivery Office Scope	Facilitate government and other partners to develop a metropolitan-scale cycling strategy and action plan
Current Status	In progress, but behind original strategy projections
Delivery Office Contributions	<ul style="list-style-type: none"> • Convened three meetings of the Metropolitan Cycling Network Senior Reference Group, comprising local government, state-level agencies and relevant transport authorities • Confirmed funding for the creation of an inner Melbourne cycling network with the Inner Melbourne Action Plan councils • Worked in partnership with the City of Melbourne’s transport team and stakeholders from the five Inner Melbourne Action Plan councils to progress and identify an appropriate project proposal for an inner Melbourne cycling network • Commenced data collection for a metropolitan-wide network model
Primary 2019–20 Target	<ul style="list-style-type: none"> • Complete the inner Melbourne cycling network model • Work with additional actors to expand this work to the wider metropolitan region

Since the launch of the Resilient Melbourne strategy, a number of advancements have been made at both local and state government levels for the progression of active transport as a primary mode in Melbourne and Victoria alike. Most notably, we have seen the creation of a more comprehensive *Victorian Cycling Strategy 2018–2028*, led by Active Transport Victoria and more recently the release of the Movement and Place framework by the Department of Transport.

At the same time, Resilient Melbourne has played a vital role as a facilitator and connecting agency for these initiatives, and other independent local government work, all with a view to creating a metropolitan cycling network. The agreed vision for this work is: “To enhance metropolitan Melbourne’s resilience and to support the liveability of our diverse communities, we aim to make Melbourne Australia’s safest, most accessible cycling city”

Progress and outcomes

Resilient Melbourne continued convening the Senior Reference Group over the 2018–19 financial year. It was agreed that a key initiative would be to map existing cycling assets across the metropolitan region for the creation of a metropolitan-wide network model. A preliminary step to creating this network model was to collate data on existing cycling infrastructure assets from councils in the metropolitan region. The next step was to identify its applicability in a pilot site.

Resilient Melbourne worked with the City of Melbourne’s transport team to propose the development of a bicycle network model project for the inner city councils via the Inner Melbourne Action Plan. The Inner Melbourne Action Plan Executive and Implementation Committee confirmed the funding for this project, and the Institute for Sensible Transport has been commissioned to develop a replicable and scalable methodology for this project. This model will take into account the existing and proposed cycling networks for individual

councils as well as the Inner Melbourne Action Plan region as a whole, and will enable councils to better prioritise cycling infrastructure to increase cycling uptake and safety.

What's next?

Following the completion of the inner Melbourne cycling network model, we will seek to expand this work to the wider metropolitan region, with critical actors such as local and state government, through the Senior Reference Group.

One of the key challenges here and throughout the process will be aligning local government priorities at a metropolitan scale, as well as their alignment with and addition to relevant state government priorities.

Resilient Communities in Residential and Mixed-use Developments

Bring together a range of partners, including property developers, councils, academic researchers and community groups, to trial new ways of putting residents at the heart of decision making that shapes their neighbourhoods.

Delivery Office Scope	Work with development project leads and partners to trial models of participatory development at five residential and mixed-use development sites across metropolitan Melbourne and bring development project leads together with academic researchers to examine the impacts of participatory development on social cohesion and community resilience over a 10-year timeframe
Current Status	In progress
Delivery Office Contributions	<ul style="list-style-type: none"> • Assisted partners at five development sites in shaping participatory development models • Facilitated scoping of research projects with development project leads and academic researchers to measure the impact of participatory development on social cohesion and community resilience • Launched research projects at two developments sites with seed funding from the Department of Environment, Land, Water and Planning, with a view to catalysing longitudinal research • Established a leadership group comprising senior stakeholders from state government, local government, the development industry and others to provide advice and guide the direction of the program • Initiated thematic research projects and delivered a consolidated literature review about the relationship between participatory development, social cohesion and community resilience, to contribute to the evidence base for the project
Primary 2019–20 Target	<ul style="list-style-type: none"> • Finalise initial research projects, including work funded by the Department of Environment, Land, Water and Planning • Formalise participatory development plans and associated research with development site and academic partners

Resilient Melbourne is supporting five development sites where partners are involving residents in the planning and creation of new residential and mixed-use communities. The aim is to trial and test the idea that future resident involvement in shaping communities can lead to stronger levels of social cohesion and, in time, community resilience.

Resilient Melbourne is working with development project stakeholders to assist in shaping models of participatory development. We are bringing these partners together with academic researchers to carry out research projects that examine the interrelationship between participatory development, social cohesion and community resilience.

Progress and outcomes

In the 2018–19 financial year, Resilient Melbourne received seed funding from the Department of Environment, Land, Water and Planning to support research projects at two greenfield development sites. These projects, conducted by Monash and RMIT universities, will contribute to an understanding of how to plan for 20-minute neighbourhoods in greenfield settings, align with *Plan Melbourne* implementation and have the potential to catalyse longitudinal research projects at these sites. Further work is required to deliver

longitudinal studies across all five sites in order to examine the interrelationship between participatory development models, social cohesion and community resilience in the face of acute shocks and chronic stresses.

What's next?

Given the long-term nature of the Resilient Communities initiative and the possibility for the projects to assume broad scopes, Resilient Melbourne identified the need to further refine the existing partnerships and research projects to reaffirm alignment with the original objectives of this Action. As an initial step, a team from The University of Melbourne was commissioned to deliver a consolidated literature review on the relationship between participatory development, social cohesion and community resilience, supporting the evidence base for the original intentions of this project.

In the next year, Resilient Melbourne will continue working with the project partners to further refine the scope of the work, to deliver both tangible near-term outcomes and scope plans for longer term research.

Spotlight on 20-Minute Neighbourhoods

In partnership with the state government, local councils, developers and universities, Resilient Melbourne is leading two *Living Locally* research projects as part of the Department of Environment, Land, Water and Planning's 20-Minute Neighbourhoods pilot program.

These research projects focus on Mambourin in the City of Wyndham and Beveridge North West in Mitchell Shire. They support implementation of the Resilient Communities program, the 20-Minute Neighbourhoods pilot program, and the commitments of both Wyndham City Council and Mitchell Shire Council to building community connectedness and resilience in greenfield developments.

20-minute neighbourhoods are a central concept from *Plan Melbourne* and refer to places where people can meet most of their daily needs within a 20-minute walk from home, with safe cycling and local transport options.

Academics from Monash University are developing recommendations for staging the delivery of social and community infrastructure in Mambourin to encourage community development in greenfield settings. Their report will be delivered in October 2019.

RMIT University researchers are building a consolidated literature review that examines the challenges and opportunities of planning in greenfield growth areas, as well as a report with recommendations about how to improve walkability and transport planning in Beveridge North West. This report will be delivered in October 2019.

The outcomes of the Living Locally research project will inform the approach to creating 20-minute neighbourhoods in Mambourin and Beveridge North West and contribute to new knowledge and improved planning practice in creating 20-minute neighbourhoods in metropolitan greenfield growth area settings.

Citymart Challenge

In partnership with the City of Melbourne’s Smart City Office, collaborate with Citymart – a 100RC Platform Partner – and a challenge panel of industry leaders and experts to crowd-source and select solutions for reducing transport congestion in ways that increase positive social interactions.

Delivery Office Scope	Worked with the City of Melbourne’s Smart City Office to review Citymart Challenge results and create <i>Open Innovation Challenge – a how-to guide for local government</i>
Current Status	Delivered
Delivery Office Contributions	<ul style="list-style-type: none"> • Worked with the Citymart Challenge winners and Resilient Melbourne Steering Committee and senior stakeholders to promote and support the winners’ findings and the expansion of their work • Supported the City of Melbourne’s Smart City Office in the creation of <i>Open Innovation Challenge – a how-to guide for local government</i>
Primary 2019–20 Target	Continue to promote the <i>Open Innovation Challenge</i> guide across local government and relevant stakeholders

The Citymart Challenge was run in 2017–18 by Resilient Melbourne in collaboration with the City of Melbourne and Citymart. The challenge sought innovative solutions to two unwanted consequences of rapid urban development in metropolitan Melbourne: transport congestion and social disconnectedness.

Progress and outcomes

Following the successful completion of the Citymart Challenge in 2018, Resilient Melbourne has been working with a number of partners to share the lessons learnt from designing and delivering this project and sharing the open innovation model across metropolitan Melbourne.

In partnership with the City of Melbourne’s Smart City Office, Resilient Melbourne developed and released [The Open Innovation Challenge – a how-to guide for local government](#). The guide builds on the lessons learnt from the Citymart Challenge and introduces the role of open innovation as a means to addressing complex urban issues in a local government context. This guide explains how to design and run an open innovation challenge. It was written for project managers in local government, but it can serve as an implementation guide for anyone.

What’s next?

During the 2019-2020 financial year, Resilient Melbourne will continue promoting and supporting the use of the open innovation guide to our partners, specifically those in local government. We will also work with those local governments seeking to explore this idea or complete their own innovation challenges.

Embed – Build resilience thinking into our institutions and ways of working

Resilient Melbourne Delivery Office

Manage all aspects of the Resilient Melbourne Delivery Office in line with agreements with the Victorian Government, City of Melbourne and other metropolitan councils, as guided by the Resilient Melbourne Steering Committee.

In 2018–19, the Resilient Melbourne Delivery Office continued to deepen and broaden the implementation of Actions outlined in this report under the strategy’s action areas: Adapt, Survive and Thrive. The metropolitan urban forest strategy Action, *Living Melbourne*, a significant piece of work, has now been delivered. *Resilient Communities* and its five associated projects have all progressed, with substantive collaboration occurring now between developers, academic teams and the Victorian Government. Plans for a metropolitan cycling network have also taken an important step forward during 2018–19, with the initiation of the Inner Melbourne Action Plan cycling network model project. Over 40% of strategy actions are completely delivered, 33% in progress, 27% are on hold or partially delivered. Given the significant complexity and innovative nature of each of our actions, this is a significant feat.

Progress and outcomes

We continue to progress the Embed actions in the strategy, with our training and workshops booked out well in advance. We are well known as a high-performing team with unique expertise and extensive networks, and our input is sought on project teams and for speaking engagements. In 2018–19, we participated in several committees, including:

- Australian Disaster Resilience Conference Program Committee
- Melbourne Food Alliance Steering Committee
- State Crisis and Resilience Council Risk and Resilience Subcommittee
- Bushfire Cooperative Research Centre End Users Group – ReCap
- Emergency Management Victoria Resilient Australia Awards (as judges)
- Master of Design, Disaster and Development RMIT Industry Advisory Committee

Our core team is complemented by interns via our formalised internship program. During 2018–19, nine interns contributed 203 days and 1504 hours to our program. We worked with two Watson fellows from the United States, which benefited our team as an exchange of knowledge and culture. We aim to continually increase the capability of interns to understand and communicate resilience, in part by including Resilience Fundamentals training as an induction module. We maintain a network of interns who support each other as they progress with study and/or their career. Our intern program has helped inform the development of a City of Melbourne intern program.

We continue to do our best to attract resources to maintain and in some cases accelerate momentum around action implementation. Although such contributions are rarely available to support the operations of the Delivery Office, we have been recipients of three grants from the Department of Environment, Land, Water and Planning to pilot 20-Minute Neighbourhoods and deliver academic reports.

What’s next?

We have been proactive in furthering discussions around Resilient Melbourne’s future operational and financial model to ensure Melburnians benefit in the medium-to-long term from Resilient Melbourne’s efforts. We will have in place an updated model by the end of the 2019–20 financial year.

Chair in Resilient Cities

Delivery Office Scope	Help develop and implement the workplan of the Chair in Resilient Cities across The University of Melbourne and City of Melbourne and together develop individual projects and opportunities for the Chair's involvement in Resilient Melbourne strategy actions
Current Status	In progress
Delivery Office Contributions	<ul style="list-style-type: none"> Supported the Chair to develop research scopes linked to five priority Resilient Melbourne actions Collaborated with the Chair and other partners at the City of Melbourne and The University of Melbourne on multiple funding applications for research on knowledge sharing and innovation
Primary 2019–20 Target	Develop and organise funding for research proposals that explore ways in which Melbourne can improve its resilience and leverage the impact and innovation that has been developed through Resilient Melbourne strategy actions

Progress and outcomes

Through his research, the City of Melbourne's Chair in Resilient Cities, Professor Lars Coenen, and his team expanded their scope to study the impact and innovation of Resilient City actions across the Resilience network and development of innovation precincts across metropolitan Melbourne.

As part of his extension of research on innovative systems that make Melbourne more resilient, in 2018 Professor Coenen delivered the annual Melbourne Sustainable Society Institute Oration, 'Resilience in the face of sustainability crises: is innovation the problem or the solution?'. His oration drew on examples of innovations implemented through Resilient Melbourne actions.

Professor Coenen's team published an open-access scientific article reporting on preliminary observations on the implementation of Resilient Melbourne actions in the international journal *Sustainability* as well as an agenda-setting article on city networks in the journal *Urban Studies*.

A number of contributors have joined in with the growing team's cutting-edge innovation and experimentation. The research outcomes contributed to a report commissioned by the Lord Mayor's Charitable Foundation, which maps the Melbourne knowledge ecosystem for healthy and sustainable cities.

What's next?

The production of scientific output of the Chair in Resilient Cities has been significant, contributing to a greater understanding of urban resilience and sustainability building through global city networks. Further efforts are needed and envisaged to make sure the academic knowledge is made actionable for Resilient Melbourne's future strategy development.

To continue to facilitate greater knowledge sharing across international sectors of scholars, Professor Coenen, his team of researchers and Resilient Melbourne plan to explore possible pathways to support the initiative aimed at fostering resilient and prosperous communities.

Resilience Training for Local Government

Incorporate resilience principles into all functions of the local government sector, through a new training program aimed at officer-level staff and above.

Delivery Office Scope	Develop and deliver resilience training for local government and other critical partners
Current Status	In progress; ongoing
Delivery Office Contributions	<ul style="list-style-type: none"> Continued to deliver Resilience Fundamentals training every second month and bespoke modules on resilience theory Facilitated bespoke workshops for multi-sector partners to apply a resilience lens to specific projects Developed the LGPro Resilience Special Interest Group for Victorian councils Developed a training web page and online booking system
Primary 2019–20 Target	<ul style="list-style-type: none"> Determine the needs of applied resilience training with alumni Create a resilience capability framework to inform training development Refine and develop applied training opportunities

The institutionalisation of resilience is an ongoing ambition of Resilient Melbourne and one that gains momentum with each year. We aim to build the capacity of our partners to understand not only what resilience means but also the contributions they can make to respond to the urban challenges across Melbourne in a way that better prepares us for the future.

Progress and outcomes

Resilience Fundamentals training is delivered every two months and continues to have a strong sign-up rate. In 2018–19, we trained 102 individuals from 45 diverse organisations, from councils to students to private-sector and community organisations. Over the past three years of operation, Resilient Melbourne has delivered Resilience Fundamentals to 300 practitioners, who now apply resilience thinking in their work. In keeping with our commitment to embed resilience with the help of Resilience Ambassadors, we invite Alumni of Resilience Fundamentals to co-facilitate future training sessions, increasing their knowledge and confidence to present within their own organisations and sectors.

In addition to the formalised Fundamentals training, in 2018–19 Resilient Melbourne improved the capacity of 1460 people at events, workshops and forums to better understand the ‘what’, ‘why’ and ‘how’ of urban resilience practice.

We have delivered capacity via workshops, events and forums to around 3500 people over the past three years. Word of mouth is the most successful engagement strategy for future participants and we are constantly proud of the positive feedback received. Value and net promoter scores average at 9 out of 10.

As the Resilient Melbourne Delivery Office grows in knowledge and experience, we become more confident and creative in applying our skills to new capacity-building opportunities in partnership with others. In 2019, Resilient Melbourne, Resilient Vancouver and Arts House Melbourne came together in Vancouver to deliver a two-day Creative Lab workshop working with Traditional Artists, emergency services, government, scientists, artists and academics. As well as working as part of the team developing and delivering the workshop, we provided a module of resilience theory from Resilience Fundamentals. The ability to deliver training that responds to different audiences in a meaningful way enables greater outreach and application, and helps us to think more creatively about how we share insights and lessons in Melbourne, hopefully contributing to long-lasting resilience outcomes.

What's next?

In 2019–20, we will work to further understand the needs of practitioners to achieve resilience outcomes in their work and develop yet more applied training to respond to these needs.

Attending Resilience Fundamentals was very enlightening and helped me to see how my work in community capacity building in the emergency management sector connects with the bigger picture of developing resilience in communities in general. It is good for people to be part of resilient and connected communities, and this is also an important factor that supports people to cope with, and recover from, shocks and disasters as well as day to day stressors.

Emergency Management Project Coordinator – local government

“ I’ve come away with a significantly increased awareness of the factors that contribute to resilience, and with some really practical tools and methods to enable me to apply a ‘resilience lens’ to work I’m doing going forward.”

Resilience fundamentals local government participant

“ The Resilience Fundamentals training helped me reframe city issues and projects I am working on to firstly consider how our interventions could foster urban resilience - but also how more integrated planning and holistic thinking, using the resilience framework, can lead to better long-term outcomes for the community. The training was tailored to allow us to spend time thinking about our current or future projects and discuss them with each other using the seven characteristics of resilient systems to guide our reflections. I think we will definitely utilise this more in our work in improving the city’s health and wellbeing and hopefully in doing so, its resilience.”

Senior Health Projects Coordinator - Health & Wellbeing - local government

“ After attending the Resilience Fundamentals training I have a much better understanding of both the importance of resilient communities and how to foster them. I feel equipped to make positive changes in my municipality.”

Senior Strategic Planner | Urban Strategy - local government

Key events and workshops

Resilient Melbourne hosted, co-hosted, presented at and contributed to a significant number of events during 2018-19. We have found that although resource intensive, involvement in such events is central to our role as a connector of sectors and networks for greater resilience outcomes. Here is a snapshot of some of the events we were proud to lead or present at.

Date	Event
July 2018	Victorian Managed Insurance Authority Risk Odyssey Event
July 2018	World Cities Summit, Singapore
July 2018	Local Government Association of Queensland Future Cities - Smart Communities Summit
July 2018	Liveable Cities Conference
July 2018	Oceania Chief Resilience Officers (CRO) Workshop
August 2018	Catalyst Network Daniel Aldrich event
August 2018	State Crisis and Resilience Council – Risk & Resilience Subcommittee – Resilient Communities presentation
August 2018	Wyndham Council presentation - Resilient Communities
August 2018	Mambourin Resilient Melbourne Project
August 2018	Refuge 2018: PANDEMIC LAB
August 2018	'Nature is Good Medicine' Summit
September 2018	Royal Society of Victoria – Future Thinking Forum
September 2018	Australian Institute of Architects presentation webinar
September 2018	Jacobs - Emerging Technologies for resilient cities: Survive
September 2018	Moreland Energy Foundation SPARK Conference
October 2018	Local Sites, Global Connections University of Melbourne
October 2018	Jacobs - Emerging Technologies for resilient cities: Adapt
October 2018	Rethinking Melbourne presentation
October 2018	Melbourne Metropolitan Urban Forest Strategy – Multi-stakeholder Workshop 4
October 2018	Local Government Professionals Resilience Special Interest Group – Event 1 - How to embed resilience into your organisation for long term change
October 2018	Resilient Melbourne Future State workshop
November 2018	ARUP - Jo da Silva Leading Thinker Series
November 2018	Hassell event - Panel
November 2018	Jacobs - Emerging Technologies for resilient cities: Thrive
December 2018	Resilience Workshop and World Forum on Urban Forestry - Milan Italy

Date	Event
December 2018	State Crisis and Resilience Council – Risk & Resilience Subcommittee – Resilient Communities presentation
December 2018	Eastern Region Meeting – Metropolitan Urban Forest Strategy
January 2019	MPavilion - Public Safety panel
February 2019	Local Government Professionals Resilience Special Interest Group – Event 2 ADAPT
February 2019	Victoria Transport Infrastructure Summit
March 2019	Melbourne Forum luncheon – Three years on are we any better prepared today to manage the challenges of tomorrow?
March 2019	Nursery Garden Industry Victoria – Fourth Green Industries Forum
April 2019	City of Melbourne Councillor Forum: Living Melbourne
May 2019	City of Casey - Living Melbourne presentation
May 2019	Frasers - Place Week presentation
May 2019	Melbourne Emergency Management Consultation
May 2019	Rivers and Ranges Community Leadership Program
June 2019	International Environmental Communications Association (IECA) - Vancouver
June 2019	VicWater Audit and Risk Symposium
June 2019	Refuge Vancouver - Disaster Resilience Creative Lab

Our Actions and the Sustainable Development Goals

This image depicts the Resilient Melbourne Strategy Actions aligned with the United Nations' Sustainable Development Goals. See figure 4 for a more comprehensive breakdown and representation of this image.

Figure 4: Our Actions and the Sustainable Development Goals

Resilient Melbourne Action	Aligning Sustainable Development Goal/s
Metropolitan urban forest strategy	Goal 3: Good health and well-being Goal 6: Clean water and sanitation Goal 11: Sustainable cities and communities Goal 13: Climate action Goal 15: Life on land
Integrated water management support	Goal 6: Clean water and sanitation Goal 9: Industry innovation and infrastructure Goal 11: Sustainable cities and communities Goal 12: Responsible consumption and production
The Neighbourhood Project	Goal 4: Quality education Goal 11: Sustainable cities and communities Goal 16: Peace, justice and strong institutions
New apartments trial	Goal 10: Reduced inequalities Goal 11: Sustainable cities and communities
Local government renewables group purchasing	Goal 7: Affordable and clean energy Goal 13: Climate action
EMV Community Resilience Framework	Goal 3: Good health and well-being Goal 13: Climate action
Drivers of Community Resilience	Goal 4: Quality education Goal 10: Reduced inequalities Goal 16: Peace, justice and strong institutions

Resilient Melbourne Action	Aligning Sustainable Development Goal/s
Community-based resilience compendium	Goal 4: Quality education Goal 16: Peace, justice and strong institutions
Innovative insurance	Goal 1: No poverty Goal 13: Climate action
Metropolitan Cycling Network	Goal 3: Good health and well-being Goal 9: Industry innovation and infrastructure Goal 11: Sustainable cities and communities Goal 13: Climate action
Resilient Communities in Residential and Mixed-use developments	Goal 7: Affordable and clean energy Goal 11: Sustainable cities and communities Goal 12: Responsible consumption and production
Citymart Challenge	Goal 3: Good health and well-being Goal 8: Decent work and economic growth Goal 9: Industry innovation and infrastructure
Young and Resilient Living Labs	Goal 4: Quality education Goal 8: Decent work and economic growth Goal 10: Reduced inequalities
STEM Mentoring Melbourne	Goal 4: Quality education Goal 8: Decent work and economic growth Goal 10: Reduced inequalities
Innovative business models	Goal 4: Quality education Goal 8: Decent work and economic growth Goal 9: Industry innovation and infrastructure Goal 10: Reduced inequalities
RMDO	Goal 16: Peace, justice and strong institutions

Resilient Melbourne Action	Aligning Sustainable Development Goal/s
Chair in Resilient Cities	Goal 16: Peace, justice and strong institutions Goal 4: Quality education
Resilience Training for Local Government	Goal 16: Peace, justice and strong institutions

Financial Report

Resilient Melbourne Delivery Office annual budget

This image is a multi-layered bar graph that represents the past, current and future budget for the Resilient Melbourne Delivery Office between Financial Year 2016-17 and Financial Year 2020-2021. The noted budgets are divided between the City of Melbourne contributions, State Government Contributions, and Contributions from other councils. The depicted amounts from the contributors is noted below.

Year 1: 2016-17

City of Melbourne contribution: AUD \$500,000

State Government contribution: AUD \$500,000

Year 2: 2017-18

City of Melbourne contribution: AUD \$333,000

State Government contribution: AUD \$333,000

Contributions from other councils: AUD \$333,000

Year 3: 2018-19

City of Melbourne contribution: AUD \$250,000

State Government contribution: AUD \$250,000

Contributions from other councils: AUD \$500,000

Year 4: 2019-20

City of Melbourne contribution: AUD \$250,000

State Government contribution: AUD \$250,000

Contributions from other councils: AUD \$500,000

Year 5: 2020-21

To be determined.

Total RMDO Expenses by category, 2018-19 (total \$1,060,011)

This image is a pie chart which depicts Resilient Melbourne's expenses, divided by category, across the 2018-19 Financial Year. The numbers in the figure are divided into four key sections and are expressed below:

Total: AUD \$1,060,011

Employee costs: AUD \$957,824

External Supports (contractors, consultants): AUD \$70,661

Events and Materials (workshops, printing etc.): AUD \$22,773

Other: AUD \$8,773

Resources leveraged by Resilient Melbourne

This image is a series of multi-layered bar graphs that represents the amount of resources Resilient Melbourne has leveraged from initial investment in the 2018-19 Financial Year.

Resilient Melbourne has leveraged \$2.05 million of total recorded outputs from an initial investment / RMDO inputs of AUD \$1 million.

This output is recorded in three key resource measures, these are: Cash, Time and In-Kind. The specific \$ amount leveraged and examples of each are noted below:

Cash: \$0.15 million – Examples include seed funding as part of 20-minute Neighbourhood Pilot Project

Time: AUD \$0.18 million – Examples include the time leveraged from the Nature Conservancy for the development and launch of *Living Melbourne*

In-kind: \$0.72 million – Examples include the salary input of the Resilient Melbourne Chair in Resilient Cities.

Acknowledgements

The work of the Resilient Melbourne Delivery Office is by definition collaborative. As demonstrated throughout this report, our efforts would not be possible without support from a broad range of partners, and we are constantly reminded of the value of their contributions. We also thank the following organisations that have provided support for the Delivery Office:

- Metropolitan Melbourne's local councils
- 100 Resilient Cities, including for contributions to the writing of this report
- Colleagues from member cities of the 100 Resilient Cities network.
- Resilient Melbourne Steering Committee, for support and strategic guidance
- Stakeholders who have participated in Resilience Fundamentals training
- The wide range of project and 100RC Platform Partners named throughout this report
- An increasing number of communities and community groups who both support our work and for whom so much of our work is intended.
- Stakeholders who joined us for the launch of Living Melbourne: our metropolitan urban forest

Photo Credits

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