



© City of Ryde

BICYCLE STRATEGY

2022 – 2030



ACKNOWLEDGMENTS

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Publication and contact details

For more information on the Bicycle Strategy 2022 – 2030 at the City of Ryde go to www.ryde.nsw.gov.au/bicyclestrategy or contact City of Ryde Customer Service Centre 1 Pope Street, Ryde NSW 2112. Phone (02) 9952 8222 or email cityofryde@ryde.nsw.gov.au.

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1

MAYOR'S MESSAGE





I am delighted to present the City of Ryde *Bicycle Strategy 2022 – 2030*. This is the first strategy of its kind in almost a decade, which will encourage and enable more people to safely and efficiently use a bicycle for transport and recreation.

Cycling is an activity that can be enjoyed by people of all ages and skill levels. It can improve people's health, reduce traffic congestion and, crucially, is a sustainable mode of transport that helps reduce emissions in our local community. Given the benefits, we want to do all that we can to encourage more people to take up cycling. It is for this reason that one of the key aims of this strategy is to make our local bicycle infrastructure connected and accessible for everyone.

Central to this will be continuing our work to create a comprehensive bicycle network throughout the local government area so that we can achieve the ultimate objective of ensuring everyone who chooses to ride a bike can start their journey from home.

We will achieve these aims by taking a leading role in the design and delivery of bicycle infrastructure, while also working with other councils and government bodies throughout metropolitan Sydney to help ensure we develop networks that expand well beyond our Council boundaries.

Importantly, the aims and objectives of this strategy are also aligned with our Community Strategic Plan as well as Council's other key transport, environment and planning strategies, ensuring a uniform approach across the business.

I would like to thank everyone who was involved in the development of the City of Ryde *Bicycle Strategy* and I hope to see everyone on a local bicycle path very soon.

Clr Jordan Lane
Mayor

2

DELIVERING SUCCESS



(Figure 1)
Cyclist riding home along Meadowbank.
Source: Photo by Fidel Fernando on Unsplash.

Attracting more people to walk and ride will support our city's growth, improve the quality of our environment, and the health and well-being of our community.

The Community Strategic Plan published in March 2018, sets out the vision for Ryde as the place to be for lifestyle and opportunity at your doorstep.

In response Council has developed a suite of plans and strategies to make the community's vision a reality. The plans take a place-based approach and bring people into the heart of decision-making.

By 2031, the number of people living in Ryde will grow and require an additional 17,000 new dwellings. This is more than a third from now.

A key challenge with a growing population is managing traffic and congestion. Today, residents and visitors heavily rely on using their own car to get out and about in the City of Ryde. This accounts for around 70 percent of trips for residents and 80 percent of trips by visitors (1).

Without a big increase in the number of people choosing to walk and cycle to places in Ryde, we will not be able to address our traffic and congestion issue. It is also essential that everyone can benefit from walking and riding. This includes better physical and mental health, improved productivity, independence to travel cheaply, and the opportunity to enjoy clean air and quiet streets.

In the last five years, we have worked with Transport for NSW, the Bicycle Advisory Committee, Connect Macquarie Park and other partners to secure significant investment to fund infrastructure for people walking and riding. This includes projects such as the Epping Road bicycle path, Lachlan's Line bridge, an active school program and a series of bicycle training courses.

Looking forward, there remains a lot more to do to make walking and riding an attractive and accessible choice for everyone in our community. Our city has great potential to make this happen. Our towns and villages are all within two or three kilometres of one another, and our residents live within a short proximity to a choice of open spaces, shops, schools, and community facilities.

This strategy is aimed at Council Officers, Council Committees, businesses and all who are interested in making Ryde the place to be in the short and long-term.

It outlines how City of Ryde will benefit from more people walking and riding, what we need to do to make walking and riding an attractive travel choice, and how we are going to do this over the next five-years.

2 | DELIVERING SUCCESS

How more people walking, and cycling will make Ryde the place to be

Streets provide a way to move around the city. They are also places where we socialise, do business and exercise.

The character of a street can influence how we feel. For example, walking along a busy road will make us feel less relaxed and safe than strolling down our local street.

This strategy aims to change the look and feel of some of our streets to make them feel more welcoming and attractive for people to walk and ride.

A diverse and inclusive city

Attracting more people to walk and ride means creating inclusive streets and gaining participation across our diverse community. And this is the founding principal for this strategy – to make everyone feel welcome (2).

An active and healthy city

By making everyone feel welcome, we will attract more people to walk and ride. This choice will improve our physical health and well-being and contribute towards Ryde becoming an active and healthy city.

Designing streets for motor vehicles has introduced a rise in car dependent lifestyles, contributed to physical inactivity and increasing levels of child and adult obesity.

In 2019, more than 1 in 5 NSW children were above a healthy weight or obese (3). Most children are not active enough and too few children use active travel to get to and from school.

More than 1 in 2 NSW adults are above a healthy weight. Adults who are overweight and obese have an increased risk of developing chronic diseases including some cancers, heart disease, diabetes, dementia and kidney disease (4).

The cost of obesity is around 8.6 percent of health expenditure; it lowers labour market outputs by 3.1 percent

of GDP and costs each Australian \$671 additional dollars in taxes per year (5).

Active travel is one of the easiest ways to include physical activity into daily life. A city with streets that welcome people to walk, and ride will be an active and healthy place to be.

A natural and sustainable city

By 2031 there will be an additional 17,000 new homes in Ryde, an additional 45,000 residents and 20,000 jobs. This growth offers vast potential for the continued success of Ryde as the second largest employment centre in Greater Sydney.

More people walking and riding means less traffic emissions and traffic noise. Today, single car passenger trips contribute to the highest quota of carbon emissions.

A city with streets designed to welcome people could deliver sustainable growth with better air quality (6), lower carbon footprint and a higher resilience to natural hazards and disasters (7).

We recognise the value in connecting with nature and the opportunities to improve access to open space for people walking, running and riding. The strategy seeks to enhance access to nature and incorporates the Open Space Strategy and Green Grid masterplan which will be progressively implemented over the next 20-years.

A connected and accessible city

Streets that are attractive to ride also provide a well-connected network of bicycle facilities. This means providing a comprehensive network of bicycle routes which connect people to all of our centres and key places.

Cities with well-connected streets are more prosperous and offer higher levels of access. Research has shown bicycle friendly cities achieve a 38 percent higher GDP per capital than cities dominated by traffic.

A smart and innovative city

Bicycles come in all shapes and sizes and accommodate a broad range of ages and abilities. New technologies such as E-bikes and E-scooters are helping more people to participate in riding.

Designing future bicycle facilities means considering the range of devices people can choose. This broadens the term riding to mean riding and scooting for the spectrum of personal mobility devices.

This will also support a smart city. More businesses are adopting bicycle courier services as they can provide more reliable delivery times in congested traffic conditions. It also enables businesses to reduce their carbon footprint and support sustainable development.

Being smart can also extend further into the methods chosen to construct facilities and the selected construction materials. New tactics like “pop-ups” reduce construction time, complexity and disruption to the community; while new materials like recycled plastics minimise our waste and protect our environment.

A vibrant and liveable city

A strategy which aims to create welcoming and inclusive streets, that attract more people to walk, ride and participate will be a vibrant and liveable city.

¹ A pop-up refers to a temporary bicycle facility. It can be rapidly implemented and appears to ‘pop-up’ on the street. This type of facility is used to test a bicycle design and evaluate benefits and impacts prior to implementing permanently.



3

UNDERSTANDING RYDE





How and where do we travel in Ryde?

More than one quarter of City of Ryde's residents live and work within City of Ryde, and a further 12 percent travel to reach jobs located in our neighbouring cities of Parramatta and Willoughby (8).

Together this represents around 27,000 of trips to work per day that are relatively close to home.

Around 6 percent of commuters and 1 in 5 children will walk or ride to work and school. Outside of these journey types there is very little data available to show us who, how often and where people are cycling in Ryde.

This strategy identifies key actions to help us collect appropriate data to inform future planning.



78%
Take private motorised transport



16%
Catch public transport



6%
Walk and ride

(Figure 3)
How do we travel to work?
Source: ABS Census of Population and Housing, 2021. Ryde LGA.

3 | UNDERSTANDING RYDE

Who is riding in our city?

The diversity and welcoming atmosphere of different cultures is a highly valued aspect of our city. This diversity of people and culture should be reflected in who we see out and about on our streets. Our aim is to attract people from all walks of life to participate in walking and riding. To achieve this requires provision of inclusive bicycle facilities and streets.

Diversity of our cycling community

The local population across Ryde is almost 50:50 male and female. On census day in 2021, 127 out of 153 people who rode to work were men. This suggests that our streets and roads are not attractive to ride for 50 percent of the population.

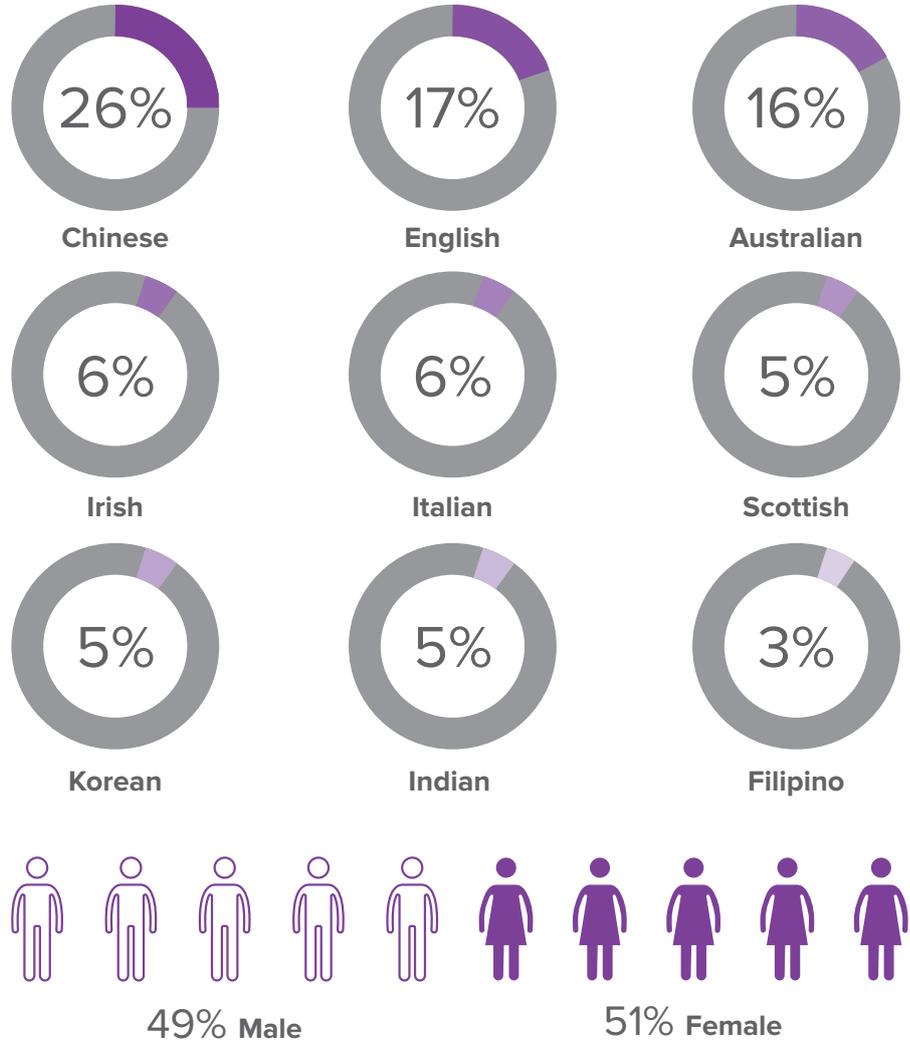
A recent study by C40 Cities investigated the reasons why women choose to ride or walk in Greater Sydney.

Overall, women who choose to ride do to do so because it's good for their health, it's enjoyable and it's free.

The key factors influencing their riding route is the availability of separated cycleways, bike lanes or quiet low speed roads.

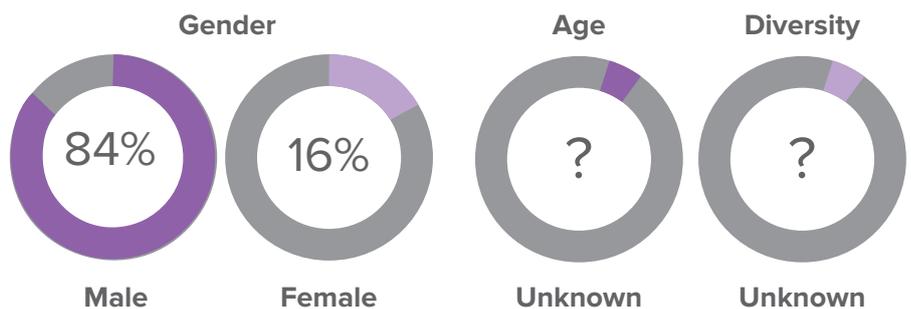
Similarly, women who choose not to ride commonly identified unsafe roads and a lack of bicycle lanes as key reasons (9).

Our City's Diversity



(Figure 4) City of Ryde's demographic diversity. Source: Community ID derived from Census of Population and Housing 2021.

People who cycle in Ryde



(Figure 5) City of Ryde's cycling statistics. Source: Community ID derived from Census of Population and Housing 2021.

Our schools and education communities

Schools

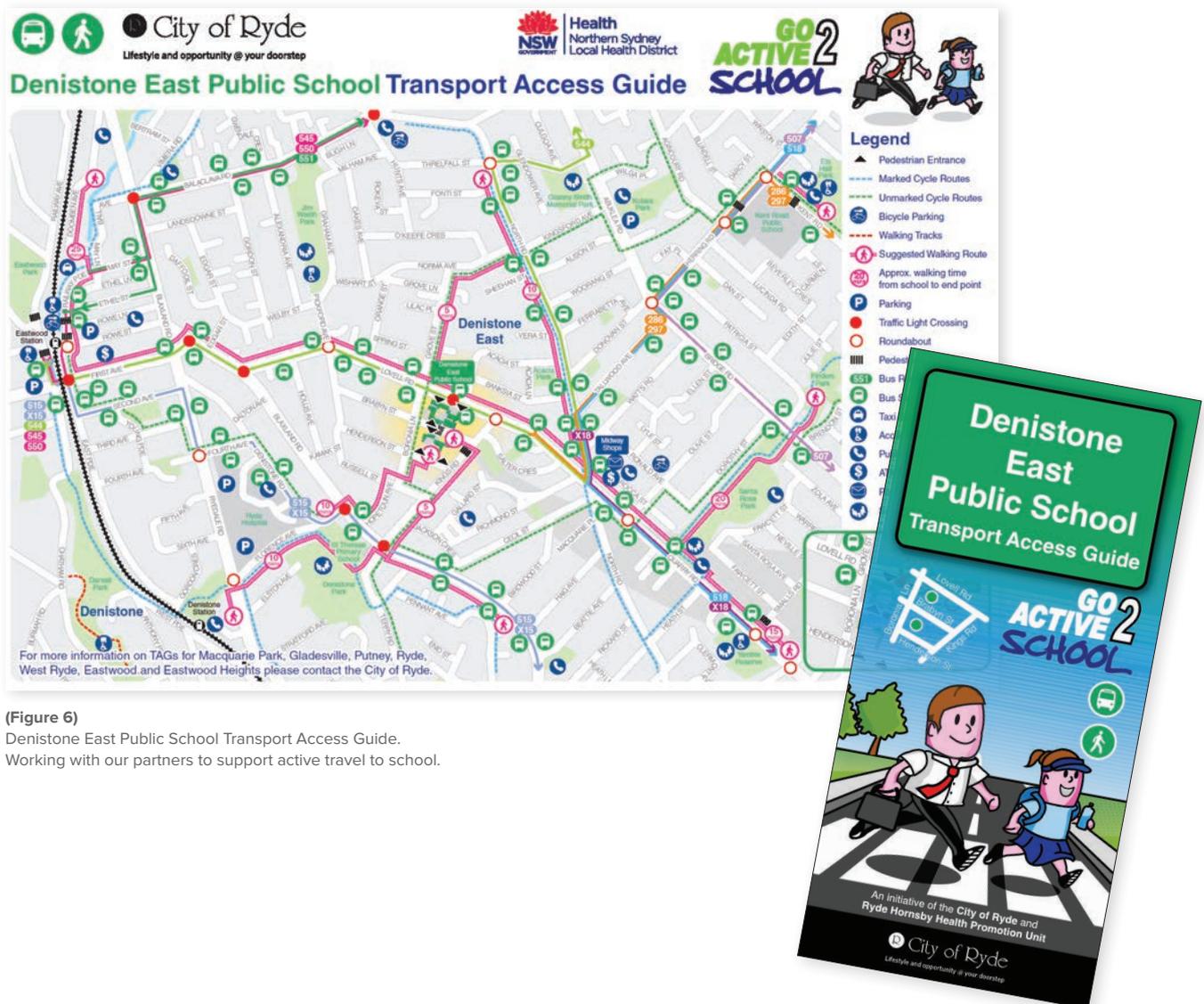
The school run contributes around 30 percent of peak hour traffic (10), which hardly goes unnoticed with local congestion and parking issues causing community tension and conflict.

This additional traffic is generated by parents and guardians driving around two-thirds of children to school (11). This is contributing to child obesity with only 23 percent of children meeting the minimum activity levels of an hour per day (12).

Research has demonstrated the extensive benefits of supporting walking and riding to school. Travelling actively improves cardiovascular health, increases concentration, reduces stress, and reduces greenhouse gas emissions (13).

To support change, there is evidence to suggest schools who are actively engaged in promoting and encouraging walking and cycling effectively increase participation. For example, schools who joined in the National Ride2School day reported active travel rates of 45 percent. This is nearly more than double the national active travel levels (14).

Over the last 10-years, Council has developed and delivered school programs to encourage walking and riding. This includes the Go Active 2 School program. Schools who participate report higher rates of walking and cycling encouraging around 20 percent of students to choose a physically active journey (15).



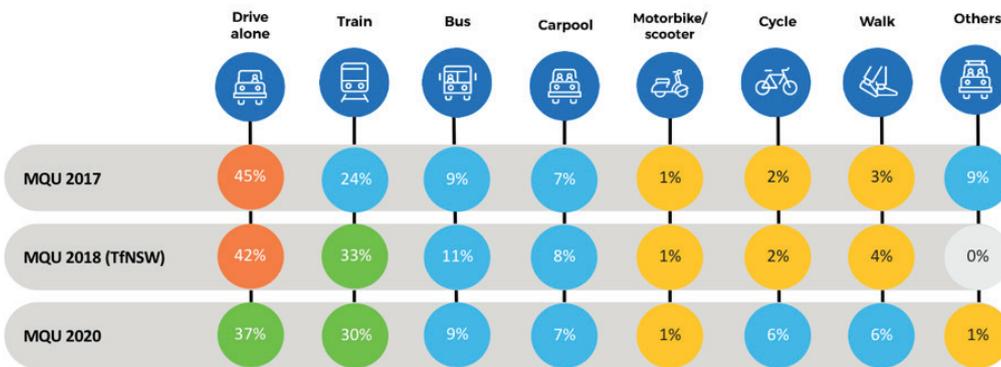
(Figure 6)
Denistone East Public School Transport Access Guide.
Working with our partners to support active travel to school.

3 | UNDERSTANDING RYDE

Macquarie University

Located in Macquarie Park, the campus brings together 40,000 students and 2,000 staff. Served by a Metro Station, regular bus services and access to high quality cycle routes via Shrimptons Creek Trail and Vimiera Road; the campus is relatively easy to walk, ride or catch public transport to in comparison to other universities in Sydney.

In July 2020, the University conducted an annual travel survey which captured the changes in travel choices during COVID-19. Since 2017, more people are choosing to walk or ride to the campus. In 2020, a significant jump in walking and riding to the University was reported from 6 percent to 12 percent. This has resulted in less people driving and using public transport.

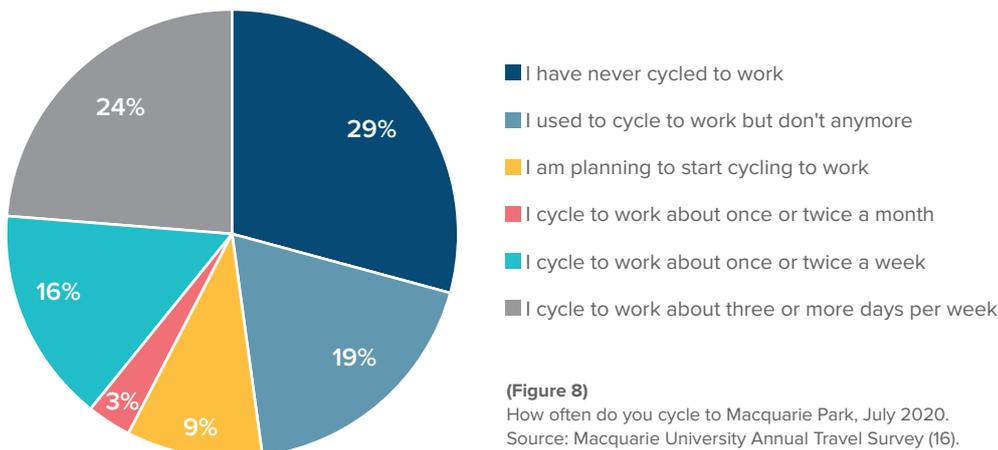


(Figure 7) Macquarie University, Travel mode over time, 2017 – 2020. Source: Macquarie University (16).

The survey also asked, “Are there any barriers you face that prevent you from cycling as part of your commute to Macquarie University?”

The most common response at 35% is “I’m concerned about the safety of my commute”

How often do you cycle to Macquarie Park?



(Figure 8) How often do you cycle to Macquarie Park, July 2020. Source: Macquarie University Annual Travel Survey (16).



(Figure 10)
Macquarie University Campus located at Macquarie Park.
Source: Photo by Fidel Fernando on Unsplash.

Our business community

Macquarie Park

Macquarie Park is an important health and education district and the fourth largest employment centre in Greater Sydney, housing more than 180 large international and 200 small businesses (17). It is the largest employment centre in Ryde, with 27 percent of Ryde’s residents working in Macquarie Park (18).

In 2020, Connect Macquarie Park & North Ryde conducted a survey to measure the change in commuter travel choices to and from Macquarie Park after COVID-19.

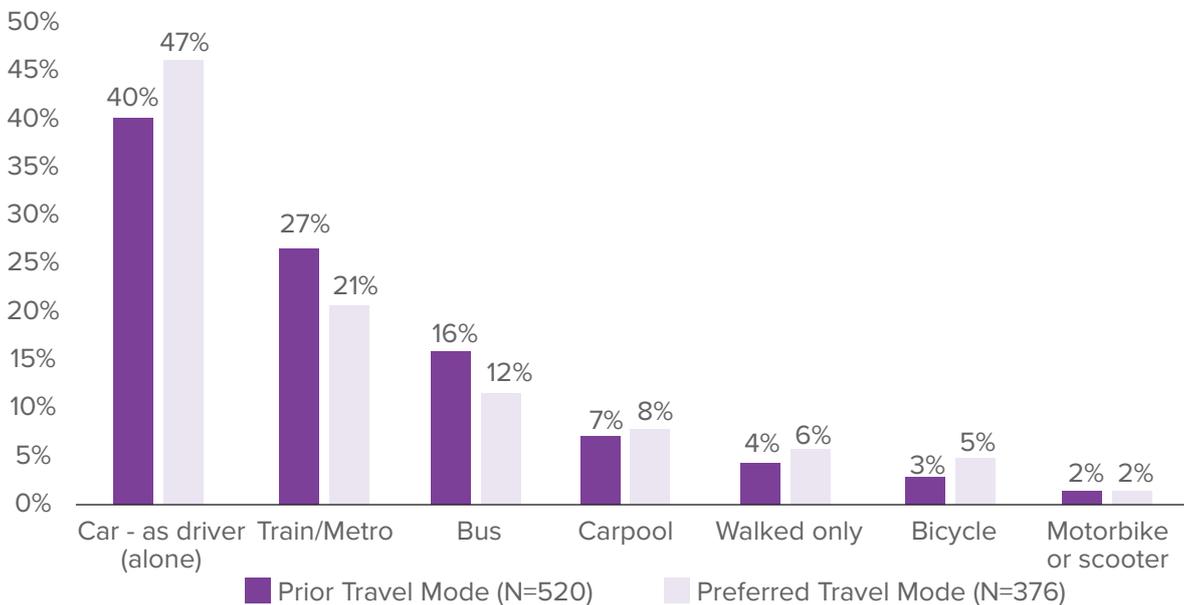
Prior to COVID-19, approximately 110,000 people came to work and study in Macquarie Park each day, with most of these people preferring to travel by car and train/metro (18).

During COVID-19 people’s usual travel methods were disrupted. This resulted in a change in a change in travel preferences and choices as shown in Figure 9.

The number of people walking to Macquarie Park is expected to increase from 4 percent to 6 percent (+2%) and cycling is expected to increase from 3 percent to 5 percent (+2%).

A 2 percent increase in cycling alone would equal an additional 2200 bicycles trips to Macquarie Park (18).

Travel mode prior COVID-19 and preferred after COVID-19



(Figure 9)
Preferred travel choices to Macquarie Park, before and after COVID-19.

3 | UNDERSTANDING RYDE

Bicycle Couriers

Bicycle couriers are commonly seen riding across the city delivering food, flowers and parcels.

Sending parcels by bike could become one of the more reliable options for on time delivery.

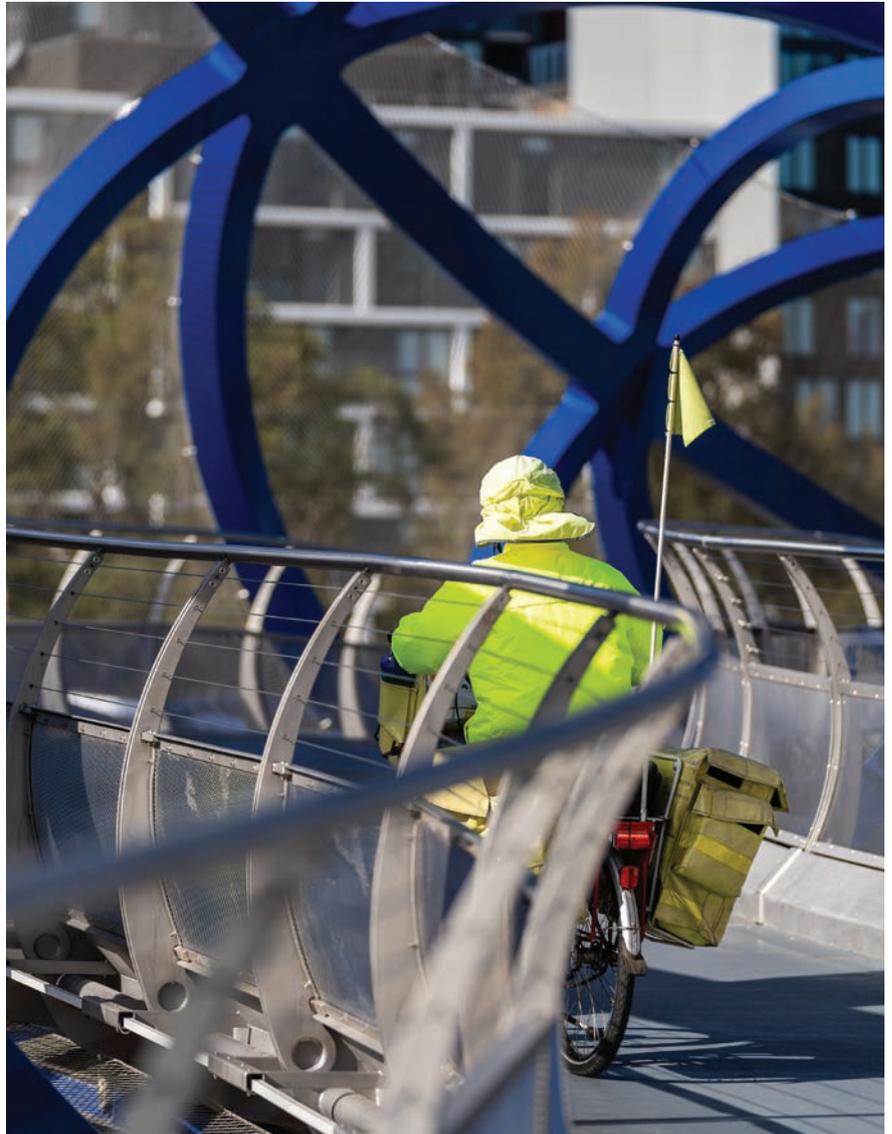
Key benefits include:

- 1. They're eco-friendly**
They support businesses in reducing their carbon footprint and minimise their impact to the environmental qualities of the neighbourhoods they are servicing.
- 2. Provide employment for individuals**
They offer easily accessible local jobs, especially for residents who do not have access to cars.
- 3. Often its faster**
Riders do not have to sit in traffic and can by-pass congestion and stop right outside the destination. Unlike vehicle deliveries, bicycle couriers usually carry one or two packages. This means they take more direct routes with less stops, reducing the chance of errors or delay.

To encourage more businesses to adopt environmental delivery services there is a need to provide a safe street environment.

In late 2020, the deaths of four food delivery riders in NSW shocked the food delivery industry and wider community. In response, SafeWork NSW formed a Food Delivery Safety Task Force. Key priorities included education to promote safer riding; and measures to provide safer streets for riders.

Continued collaboration with local businesses will support the achievement of better working conditions for bicycle couriers.



(Figure 11)
Bicycle courier operations are expanding across our city and support many of our local businesses.

Recreation

The adaptation of the bike, emergence of mobility devices and bike share schemes; presents many options to help people move around the City of Ryde. From toddlers on trikes, to hand propelled bikes, and E-bikes which help riders tackle hills with ease.

The range of devices makes riding an accessible activity that can be enjoyed by everyone.



(Figure 12)

A variety of devices to actively move around the city²

² E-scooters are recent entrants to the mobility market. They are not legal to ride on public roads in New South Wales.



(Figure 13)

More than 500 people enjoy walking, riding and scooting along the Ryde Riverwalk each day.

Source: City of Ryde, Morrison Bay.

3 | UNDERSTANDING RYDE

What discourages people riding?

Research and user preference surveys highlight two common reasons why people do not choose to ride.

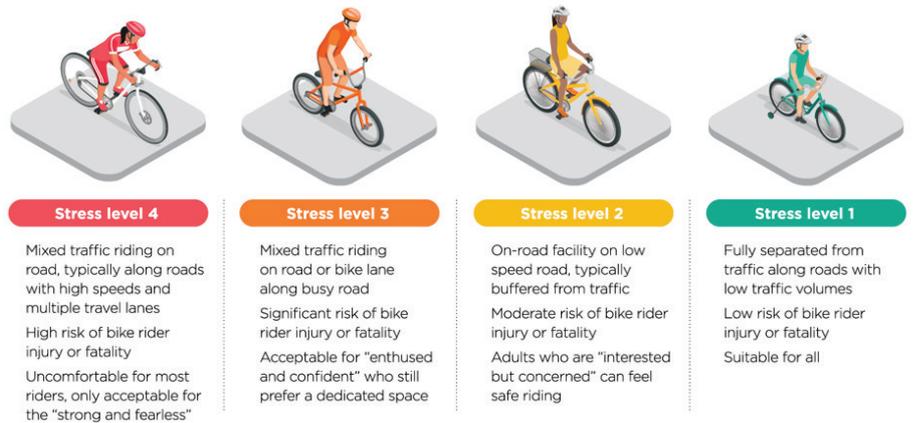
This strategy and action plan aims to overcome these barriers by introducing strategies and actions to encourage more people to walk, ride or scoot for multiple journey purposes.

Safety, fear and vulnerability

Research findings show the perception of safety varies considerably by the type of bicycle facility. In general, the higher the level of separation from motorists and other road users, the safer the majority of riders will feel when using the facility. Another term for this is traffic stress.

Around 60 percent of the City of Ryde’s bicycle network is comprised of mixed traffic routes recognised by the bicycle logos on the road. This facility means people riding share the traffic lane with cars, trucks, buses and parked cars. As shown in Figure 16, most of the existing facilities do not provide a low traffic stress environment which would appeal to most of our community.

We are tackling this by proposing to invest more to make Ryde’s streets safe and attractive for people walking and riding.



(Figure 14) Levels of traffic stress (Transport for NSW, 2020).



Separated cycleway + bike lanes



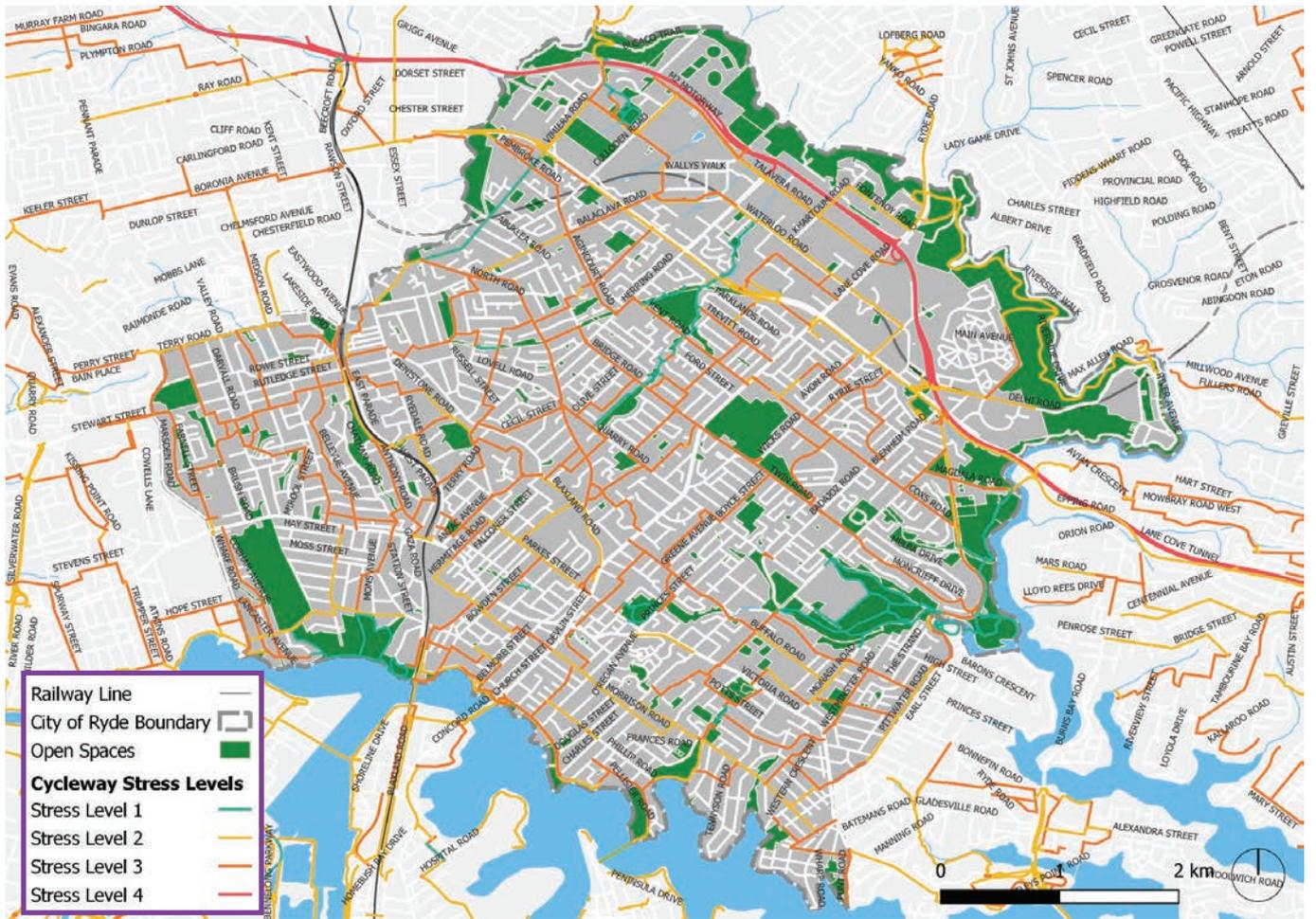
Shared user path + road shoulders



Mixed traffic + bicycle logo in parking bay



(Figure 15) Safety perception by facility type, Level of traffic stress presented by existing bicycle infrastructure. Source: Sydney’s Cycling Future Strategy, TfNSW, 2013.



(Figure 16) Existing levels of traffic stress, City of Ryde Bicycle Network (2021).

3 | UNDERSTANDING RYDE

Public image

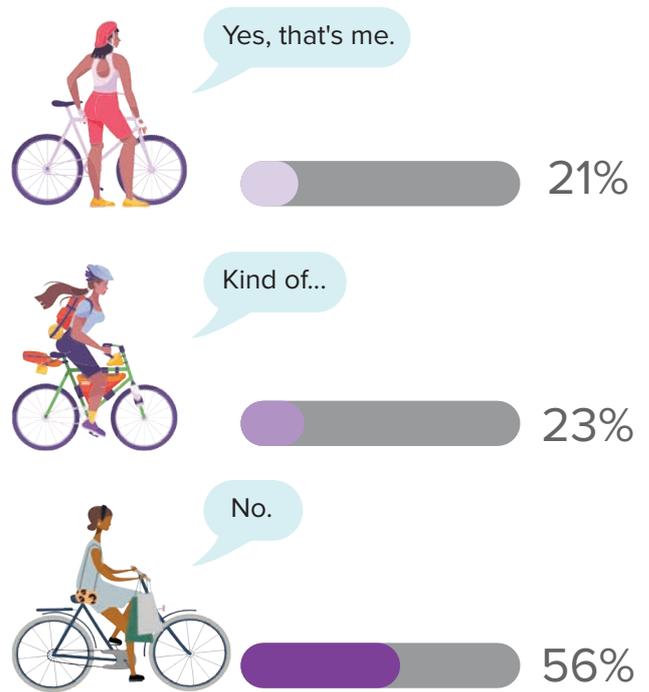
How people view cyclists can act as a barrier or facilitator to participation.



(Figure 17)
Typical public image of a fearless cyclist, Bondi Road, Sydney.
Source: CrossleyTP.

Stereotypes of men in lycra and associated descriptions as 'brave', 'eco-warrior', 'fit' can act to discourage people.

When asked "is this you?" women replied:



(Figure 18)
The association of female riders with the image of a cyclist (Cred 2020).

By breaking down stereotypes we can help encourage more people to ride and normalise cycling as an everyday activity. Council plans to further develop our education and promotion campaigns and collaborate with partners to deliver these actions.



(Figure 19)
The public image of what it means to be a cyclist compared to who seen riding on the street.

3 | UNDERSTANDING RYDE

Who has the potential to ride more?

Potential trips and purposes

At less than ten kilometres to travel from one side of Ryde to the other, the city is relatively compact.

Most of City of Ryde’s town centres are within a one or two-kilometre walk or ride from one another. This is less than a 10-minute journey by bike.

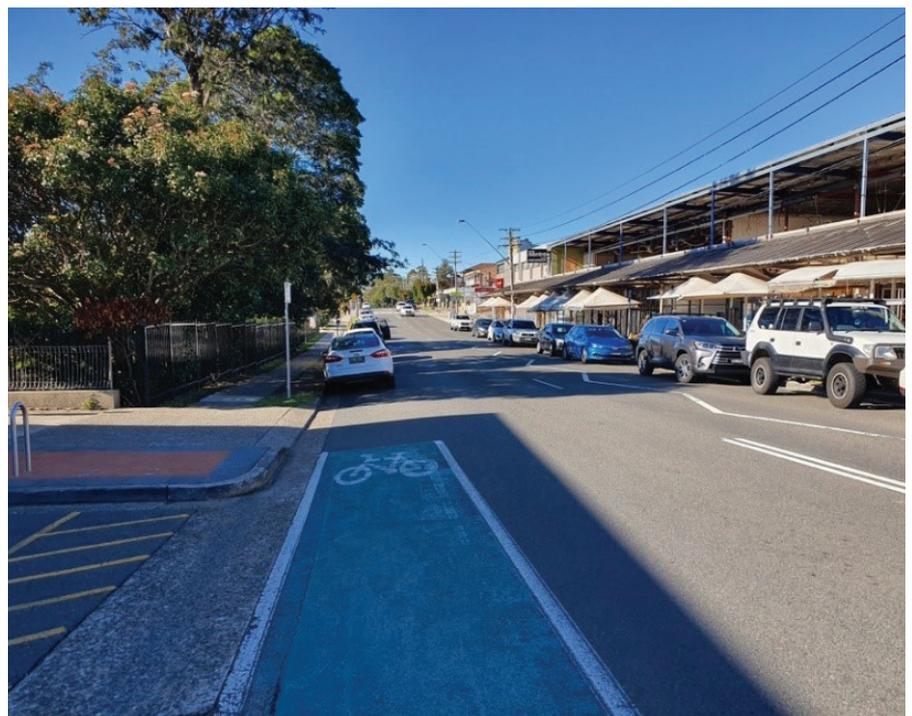
By doubling this to a 20-minute bicycle ride, all of our centres are fully connected.

This offers the potential for most local transport movements and daily errands to be completed by bike.

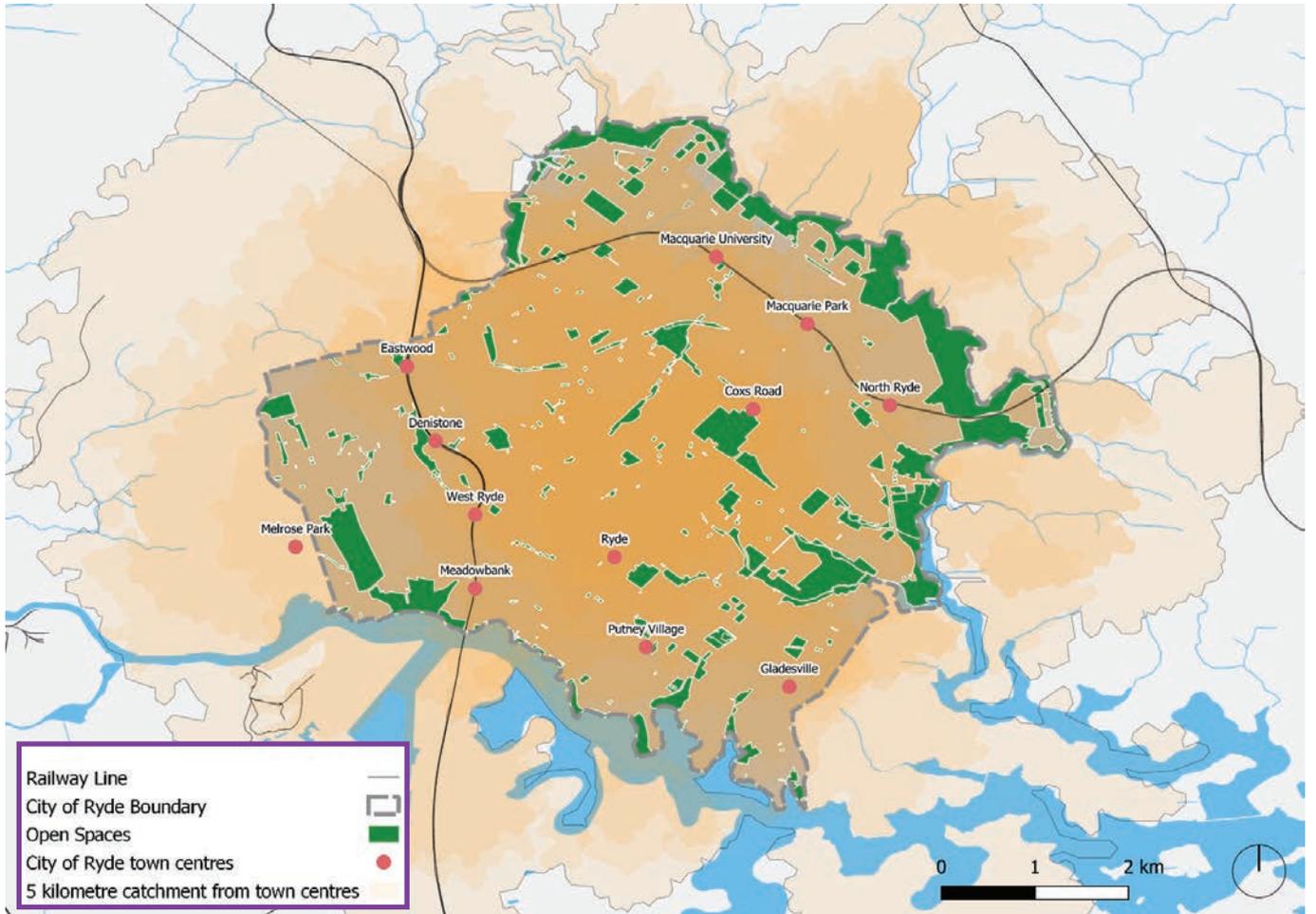
Well-connected centres, shopping, schools and parks offer a real alternative to needing a car to get around the city.



(Figure 20)
Connectivity to Coxs Road shops and cafes. Improved cycling infrastructure/conditions could encourage more people to ride to the village centre.



(Figure 21)
Coxs Road bicycle lane.



(Figure 22)
 A five-kilometre walk or ride from any town centre can take you to many places in Ryde.



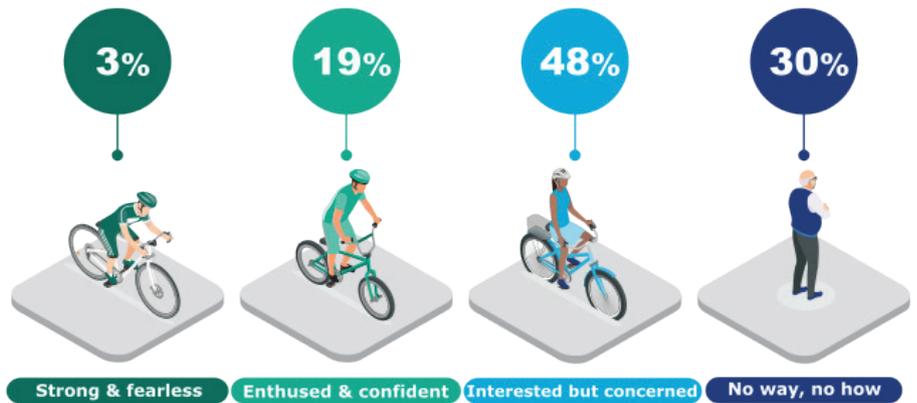
3 | UNDERSTANDING RYDE

Who?

We want to attract everyone to ride in our City, and offer people of all ages, abilities and cultures the choice to participate.

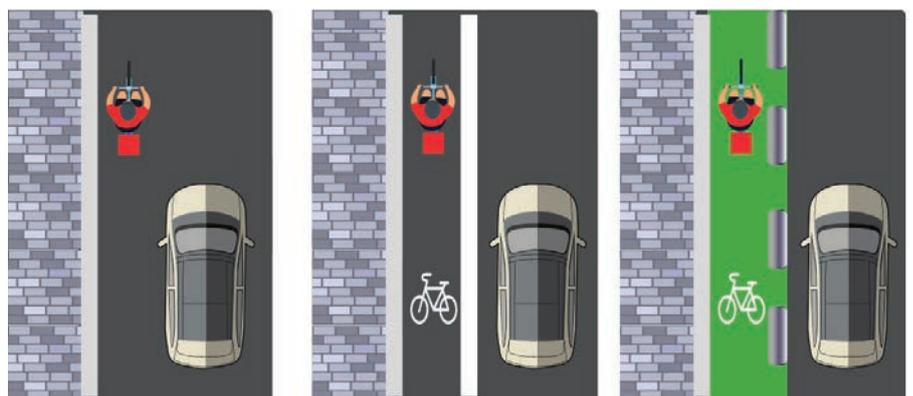
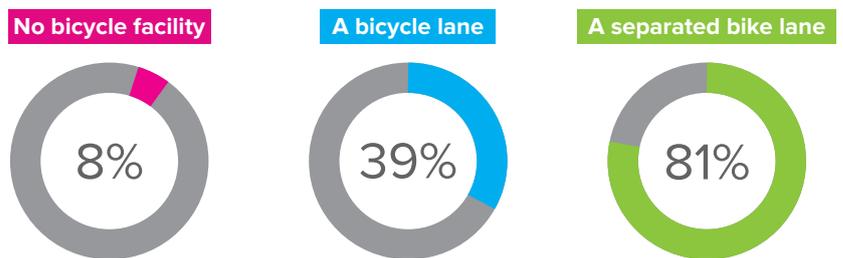
The largest community of riders consist of the “Interested but concerned” group. This 48 percent of the population represents people who can be encouraged to ride more frequently. Their willingness to ride is influenced more by the quality of the available bicycle facilities and the associated perceived level of personal safety.

This strategy includes a suite of priorities to improve the degree of separation and level of protection provided to riders on existing and future bicycle facilities with the aim to attract the interested but concerned onto our bicycle network (refer to section 4).



(Figure 23)
Community of riders.
Source: Extracted from the Bicycle Design Toolbox, TfNSW (19).

Of the interested but concerned, percentage who are comfortable with



(Figure 24)
Likelihood of attracting the interested but concerned.
Source: Data taken from NACTO, 2016 and image by CrossleyTP, 2021.

4

VISION FOR
RYDE



Our aim is to make Ryde the place to be for cycling by creating an environment where everyone who chooses to ride can do so from their front door, workplace and/or education facility.

Ryde is home to the second largest business district outside of Sydney City Centre.

The city offers people who live, work or visit, a choice of vibrant town centres, places of cultural and historic interest set amongst the scenic surrounds of Lane Cove National Park and Parramatta River foreshore.

Achieving our vision means our streets will reflect our diverse community with a bicycle network that everyone can use. This means our cycling network services the needs of our residents, businesses and visitors. In so doing, we will attract more people to walk and ride.

This will help us to grow sustainably by reducing traffic congestion and noise, improve air quality and improve our physical and mental well-being.

This strategy identifies four key outcomes to guide action towards achieving our vision.



Connect Ryde

Our places will be connected by a comprehensive bicycle network.



Ryde Easy

Our bicycle facilities will be inclusive and attractive to use by everyone.



Ryde More

We will proactively encourage participation and overcome reasons why people do not choose to ride.



Ryde Ahead

Strong leadership and partnerships to positively influence the image of cycling, secure investment and seek innovation to break boundaries.

(Figure 25)
Four visions of the Ryde Bicycle Strategy 2021.

5

CONNECT
RYDE



Connecting our places with a comprehensive bicycle network.

The approach to connect Ryde

Council's goal is to deliver a bicycle network that connects people from their door to our vibrant centres, open spaces, schools and places of work.

To achieve this goal, Council must provide continuous connections to the City of Ryde's town centres, villages and public transport hubs.

Council proposes four tactics to deliver a comprehensive bicycle network.

Complete the regional bicycle network

The regional network is illustrated in Figure 27. It is designed to provide connectivity for people who ride between major destinations across Greater Sydney. In the City of Ryde this includes a Principal Bicycle Network led by Transport for NSW, and a set of twelve Council-led regional routes.

The Principal Bicycle Network forms part of the Greater Sydney Future Transport Strategy 2056. Partially funded by Transport for NSW, this network aims to support trips between major centres like Chatswood, North Sydney and Macquarie Park.

During the last five-years Council have partnered with Transport for NSW to deliver around 85 percent of the planned regional bicycle network.

Achievements include the delivery of high-quality bicycle routes at:

- Shrimptons Creek
- Epping Road
- Pittwater Road
- Vimiera Road
- The foreshore path from Meadowbank to Kissing Point.

Council's Regional Routes provide additional connectivity to key town centres within the City of Ryde. Council has delivered around 80 percent of the regional routes.

Over the next five years our priority is to complete the remaining 20 percent of the regional bicycle network and to expand it to support future population and employment growth.



Complete the Regional Network



Expand the Regional Network to connect all centres in the City of Ryde



Provide links to major public transport hubs



Improve access accessibility by completing missing links and gaps in the network

(Figure 26)

Four tactics to connect places in the City of Ryde.

5 | CONNECT RYDE

Connecting our centres

A well-connected city will encourage more people to choose to ride. This means linking all of the City of Ryde's centres with continuous, high quality and easy to follow bicycle routes.

The city is compact, most of our towns and centres are within a short distance of one another. This offers the potential to ride between these places for everyday trips.

To leverage this opportunity, a centre-to-centre bicycle network (C2C) is planned and will connect people to every centre in Ryde. This network also provides connectivity to open spaces, schools and hospitals.

To help fund the delivery of high-quality routes, this strategy involves advocating to NSW Government to recognise the C2C as a regional bicycle network and partially fund its implementation.

Door-to-door-to-door

Our journeys are often made-up of smaller trips using a variety of travel modes. This type of journey is known as trip chaining or door-to-door-to-door. They often involve some walking, riding and public transport.

To support this type of travel behaviour we will provide safe access to public transport hubs and major bus stops for people walking and riding. This will include safe crossings and bicycle links.

To enable people to change travel modes at stations and major bus stops we will support and advocate for the provision of high-quality bicycle parking facilities. This will enable people to leave their bike easily and securely until their return journey home.

Bike share and mobility schemes such as e-scooters³ when located near stations and public transport hubs offer residents and visitors an on-demand travel service when desired. This option can present a cheaper and more sustainable travel option than taxis', kiss and ride and park and ride options.

Closing gaps and complete missing links

Most people will only choose to ride if the bicycle facility continues for the full length of their journey. Small gaps such as a busy road crossing can discourage people from riding.

This means delivering complete routes and links which continue through intersections. In the past, this approach has been cost prohibitive. For example, to deliver the high-quality routes along Epping Road and Pittwater Road required to be staged over multiple financial years to fund their construction. Two stages of the County Road Corridor have been delivered with the remaining stages to be implemented within the next five-years.

An alternative approach is to implement a route using temporary or interim materials which are cheaper and faster to install. This could allow Council to deliver more for less, with opportunities to upgrade as cycling demand along the route increases.

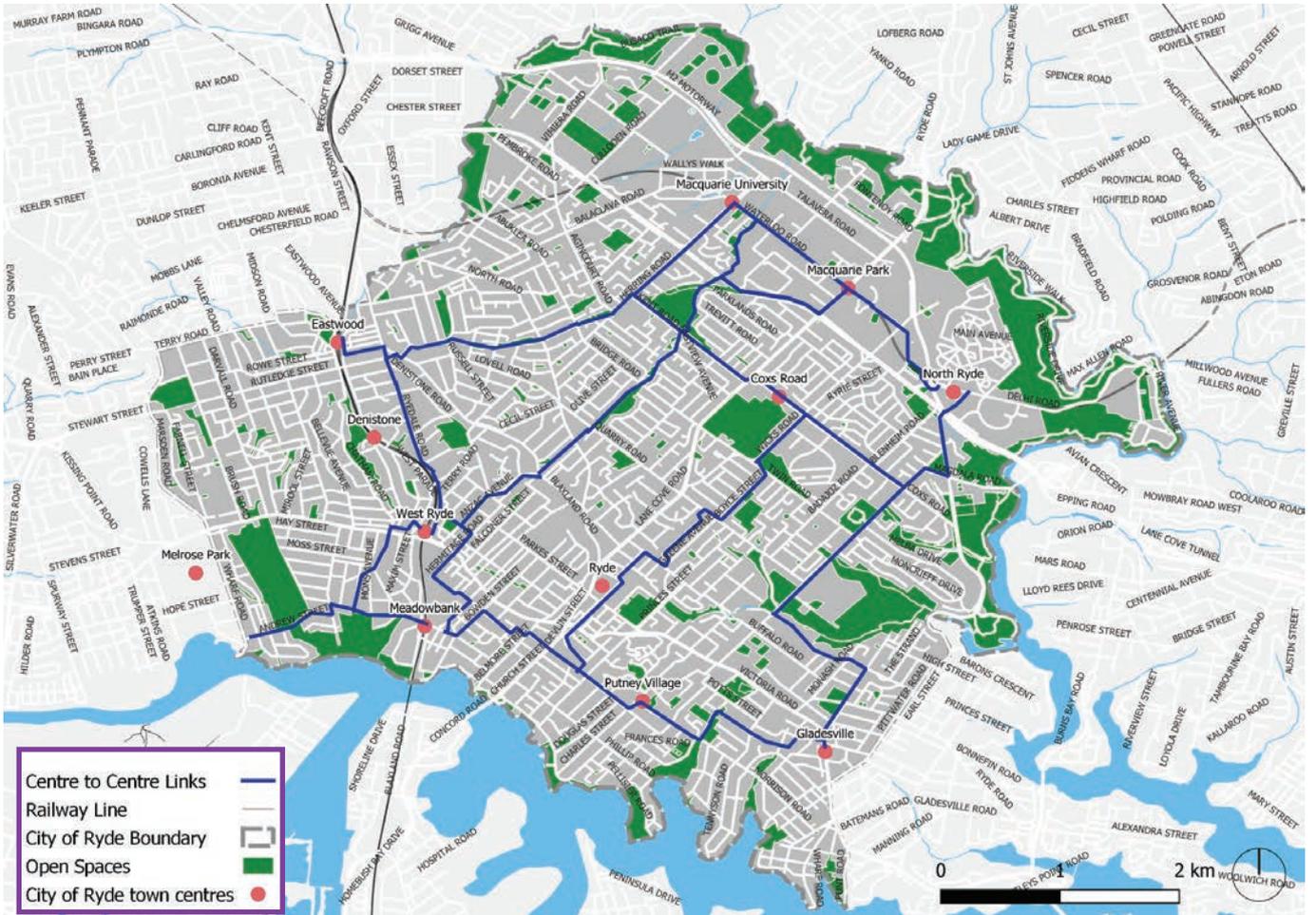


³ E-scooters are recent entrants to the mobility market. They are not legal to ride on public roads in New South Wales, however, as other states legalise E-scooters, they could become an acceptable transport option in the near future.



(Figure 27)
 Ryde's regional bicycle network showing the completed and planned routes partially funded by NSW Government.
 Source: City of Ryde Asset Data, Cycleways April 2021.

5 | CONNECT RYDE



(Figure 28) Centre-to-centre network: expanding the regional network to include high quality connections to our centres.

Our Priorities

To deliver the vision for a well-connected city, Council will:

CR1. Advocate to the NSW Government to accept and adopt our centre-to-centre (C2C) bicycle network and gain regional bicycle network status for the routes.

CR2. Advocate to NSW Government to fully fund the portion of the principal bicycle network located on state roads.

CR3. Adopt a route-based delivery approach. This will secure ridership from day of opening and will avoid missing links and gaps forming in the network.

CR4. Gain multi-year funding agreements with NSW Government for the regional bicycle network to ensure the completion of routes.

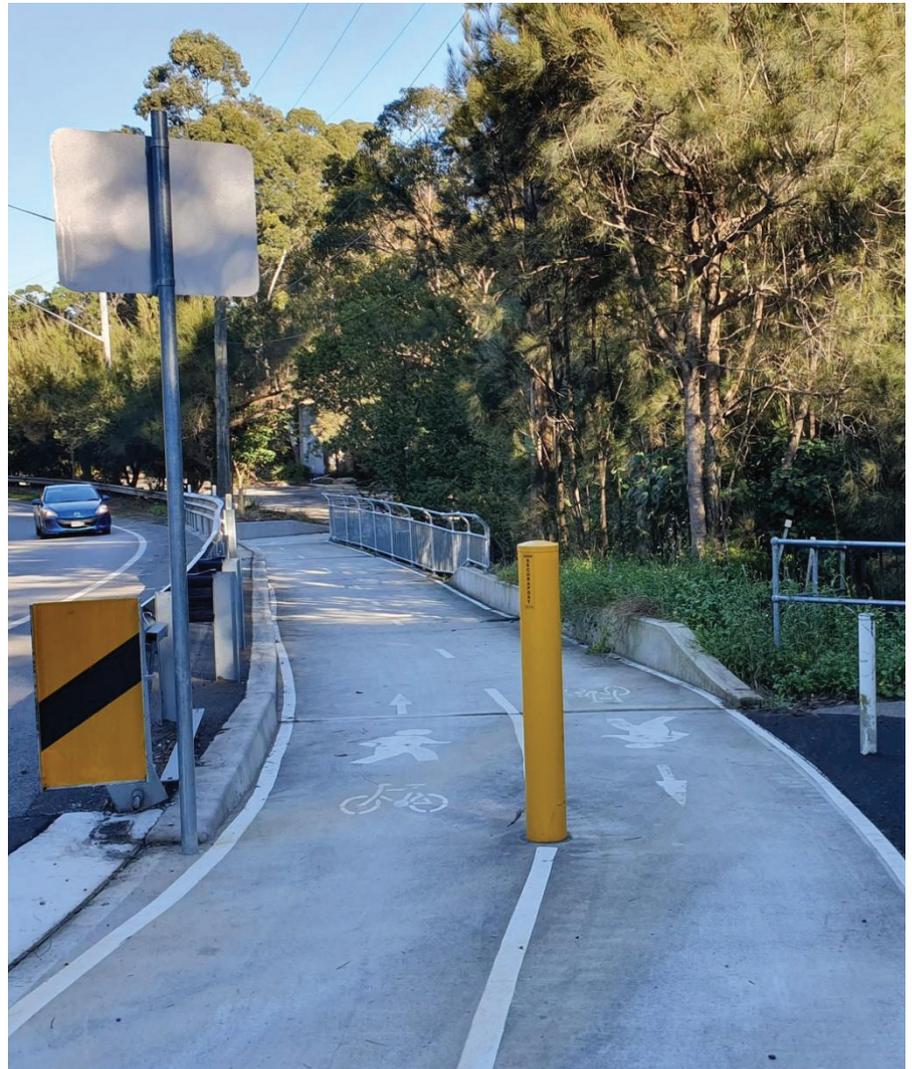
CR5. Complete the regional bicycle including the C2C routes. Prioritise routes based on potential ridership e.g., number of commuting trips to and from centres.

CR6. Integrate walking and cycling connections as part of the planned new street network for Macquarie Park.

CR7. Deliver the Meadowbank Education and Employment Precinct walking and cycling links contained in the master plan in partnership with developers and State Government.

CR8. Deliver the West Ryde Town Centre walking and cycling links contained in the master plan in partnership with developers and State Government.

CR9. Partner with City of Parramatta to plan and deliver a bicycle connection from Meadowbank to the Melrose Park Precinct.



(Figure 29)
Pittwater Road regional bicycle shared path, Field of Mars Reserve.

5 | CONNECT RYDE

CR10. Partner with Kur-ring-gai Council to plan and deliver improved connectivity from North Ryde to West Lindfield.

CR11. Complete the missing links in our local bicycle network.

CR12. Improve access to our open spaces and waterways by completing walking and cycling tracks within our green open spaces and planned green links.

CR13. Deliver bicycle parking facilities at our key local places, community facilities such as schools, parks and libraries, and at public transport hubs, to enable people to choose to ride and reduce pressure on local car parking. This could include bicycle racks, bicycle stations or bicycle valet parking with appropriate shade, security, equipment to fix or even charge an electric bike.

CR14. To measure our success and levels of bicycle participation, a program of bicycle surveys and/or counts shall be developed.

CR15. Partner with Sydney Water to investigate and fund the delivery of walking and cycling trails along creeks. Specifically, the provision of a walking and cycling bridge adjacent to the water pipeline over Lane Cover River at Rudder Creek Trail and Khartoum Road.

CR16. Develop a Smarter Travel Program of bicycle connections which link people from our train stations, ferry wharfs, metro stations and major bus stations to and from key destinations located within a 1km riding distance.

CR17. Investigate opportunities to convert laneways and narrow streets into Bicycle Boulevards. This is an enhanced mixed traffic environment where people riding are given priority position in the traffic lane, with enhanced road markings and traffic calming features.



(Figure 30)
Laneways present opportunities for low traffic bicycle routes.

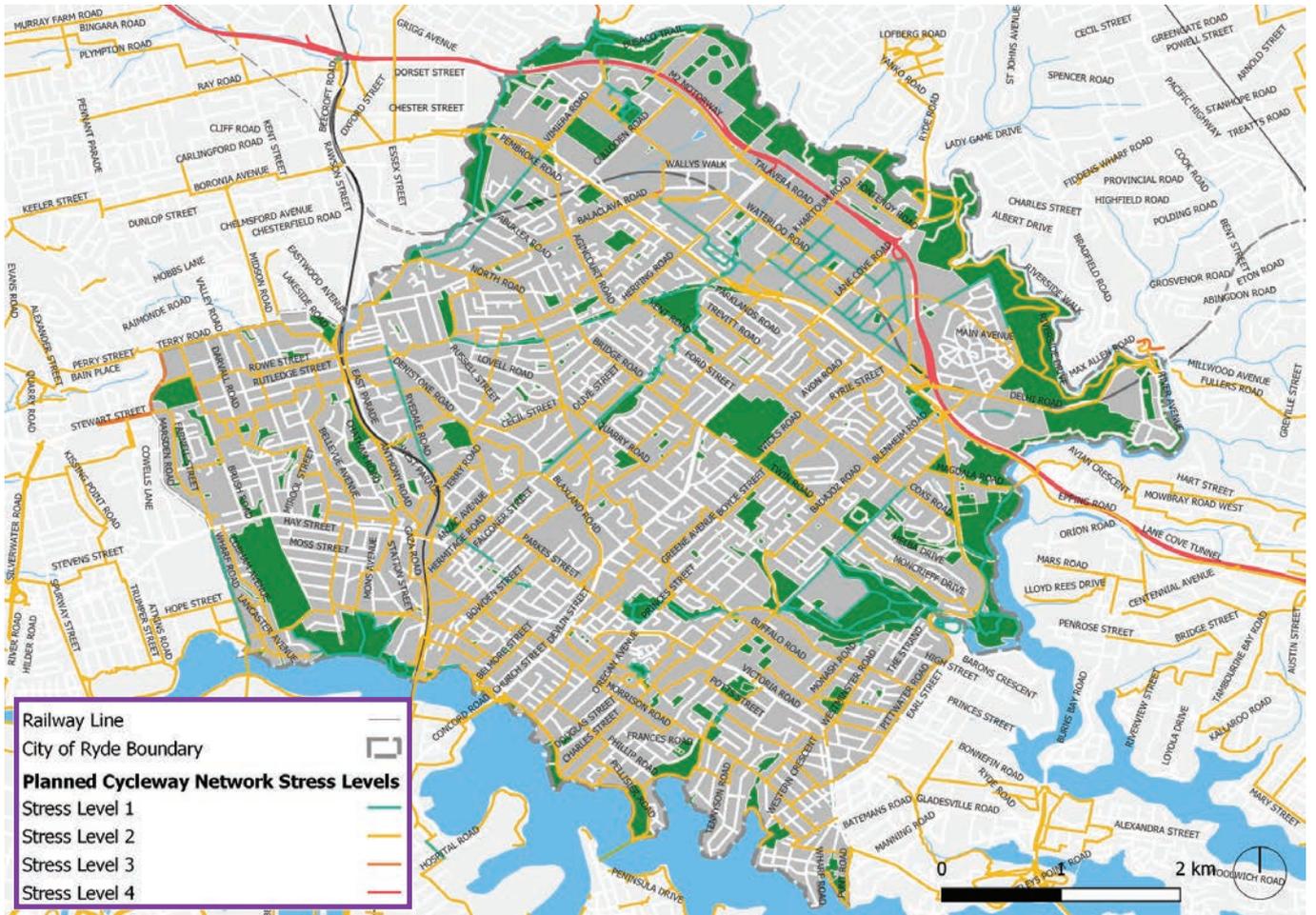
CR18. Investigate opportunities to convert wide footways into shared-user paths in areas with low pedestrian activity.

CR19. Review local policy and controls to facilitate safe uptake of shared bicycle schemes and providers. Controls should aim to encourage fair and safe use of public space and the sharing of data to help us evaluate schemes and quantify benefits.

CR20. Partner with neighbouring councils and advocate for better bicycle lanes and improved connectivity to Parramatta, Epping, Eastwood, Pymble, Chatswood, Lane Cove, Hornsby, Rhodes, Sydney Olympic Park, Burwood and Duck Creek.

CR21. Assign a budget and develop an annual cycleway maintenance program to keep the bicycle network serviceable.

CR22. Deliver local bicycle links within a 1km catchment of schools.



(Figure 31)
 Making riding easy and comfortable by delivering a low traffic stress environment.

6

RYDE
EASY



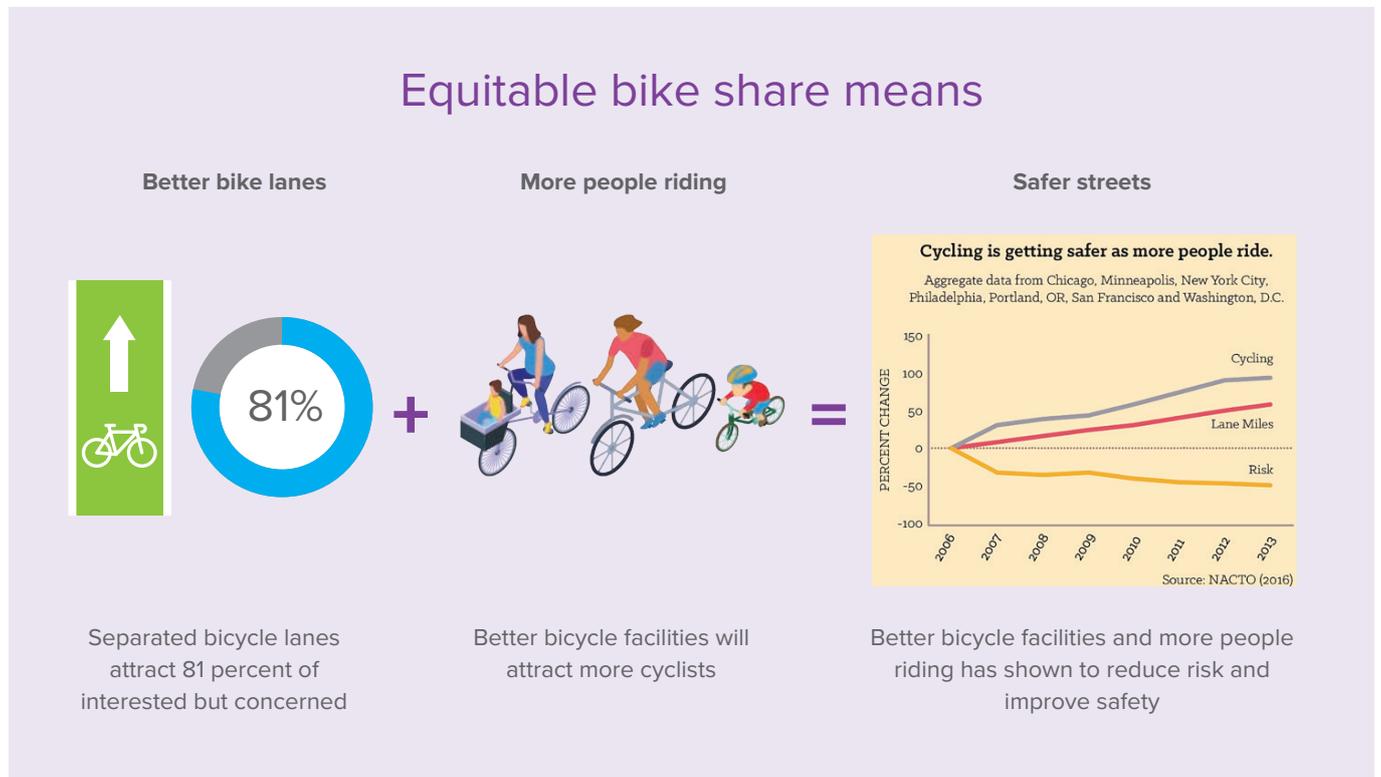
Figure 33 – Delhi Road, North Ryde. Adding bicycle lanterns will make it legal for people riding on shared user paths to cross at signalised intersections.

6 | RYDE EASY

Everyone who chooses to walk or ride, can do so from their front door

The approach to make riding easy

Making riding easy means creating inclusive and welcoming streets where people feel safe, comfortable, and relaxed. To attract potential riders who are interested but concerned, the existing bicycle facilities will be upgraded, and new facilities designed to offer appropriate levels of protection from traffic.



(Figure 32)
Better bike lanes means more people riding and safer streets.
Source: Adapted from NACTO, 2016.

6 | RYDE EASY

Make riding comfortable

There are six design criteria which ensures the bicycle network will improve in quality to deliver bicycle friendly streets.

The diagrams describe the criteria for inclusive bicycle facilities adopted from Healthy Streets[®] practices and Transport for NSW Cycleway Design Toolbox.

Adoption of the criteria as a benchmark for quality will ensure new bicycle facilities provide an attractive option to travel within the city for most of the community.

1. Mixed Traffic

This street environment is appropriate in quiet streets with low traffic volumes. Most motorists should be travelling no faster than 30km/h with few trucks and buses.

Up to 500 vehicles / hour



Less than 5% trucks

2. On-road bicycle lane

As the number of passing vehicles increases and average traffic speeds reach 40km/h an on-road bicycle lane should be provided to offer more protection and retain a good level of comfort.

Up to 1000 vehicles / hour



Less than 5% trucks

3. Off-Road Bicycle Facilities

Streets with more than one traffic lane in each direction and where traffic speeds reach 50km/h, it is considered appropriate to fully separate cyclists from motorists.

Up to 200 people / hour



Shared user paths can provide a good option where there is less than 200 people walking on the path per hour.

More than 1000 vehicles



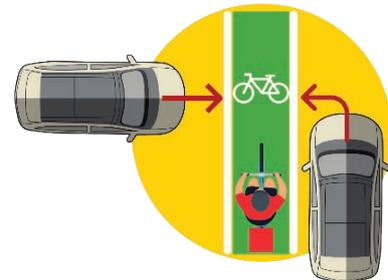
More than 5% trucks

Separated cycleways are another option where shared user paths are not appropriate or desirable.

4. Protection from turning and emerging traffic

People riding both on-street and along shared user paths will have motorists turning across or emerging in front of them at intersections and driveways.

To reduce this collision risk, intersections should be designed to protect people riding against turning traffic. At high traffic driveways e.g., at a shopping centre, design features should highlight the presence of cyclists.



5. Comfortable width and space to ride

Enough space should be given to people riding to enable them to:

- Safely avoid opening car doors when passing parked cars
- Sufficient clearance between a rider and an overtaking motorist, in particular large trucks.



Make it safer

Reducing traffic speed is the most effective way to improve safety and make walking and riding comfortable.

Road trauma is the number one cause of death in school-aged children. Evidence is clear that 40km/h speed limits are not low enough. The chance of surviving a collision at 30km/h increases from 60 percent to 90 percent. Low-speed streets have the potential to reduce the national road toll by 13 percent which is around \$3.5 billion each year (20).

Low-speed streets also improve liveability. They make walking and cycling more attractive. Shifting from car trips to sustainable forms of transport can reduce congestion, air pollution and increase physical activity and community health.

NSW Government is conducting a number of 30km/h speed limits and zones across Greater Sydney such as Manly and Liverpool. This presents an opportunity to pilot safe active streets around our schools and villages.

Where possible, the safest option is to provide separated and protected bicycle connections. This means applying appropriate features to create a buffer between people riding and motorists; as well as separating people riding from people walking on footways. Bicycle facilities should continue across intersections and enhance the visibility of people riding.

Increasing the provision of separated and protected bicycle lanes will be one of the key factors in influencing people's perception of cyclist safety and willingness to participate in cycling. This behaviour is evident amongst the Interested and concerned cyclist groups where 81 percent of surveyed people will feel more comfortable with a separated bicycle facility.



(Figure 34)
Wayfinding sign located at Coxs Road heading toward Macquarie Hospital.

6 | RYDE EASY

Make routes easy to follow

Paper maps, GPS devices, online tools and mobile phone applications all help users to find their way in the city. Bicycle riders need assurance that the selected route is safe, direct and will take them all the way to the destination. This would require considerable pre-ride planning or rider-experience to learn the best routes.

For first time riders or visitors this can be a daunting task. It is therefore important to tell people where the bicycle routes will take them, how long it will take to reach and where to park a bike at the destination.

Wayfinding signage is a tool used to achieve all the above. This can include a sign mounted on a post, road markings or other visual cues which people can easily follow from A to B.

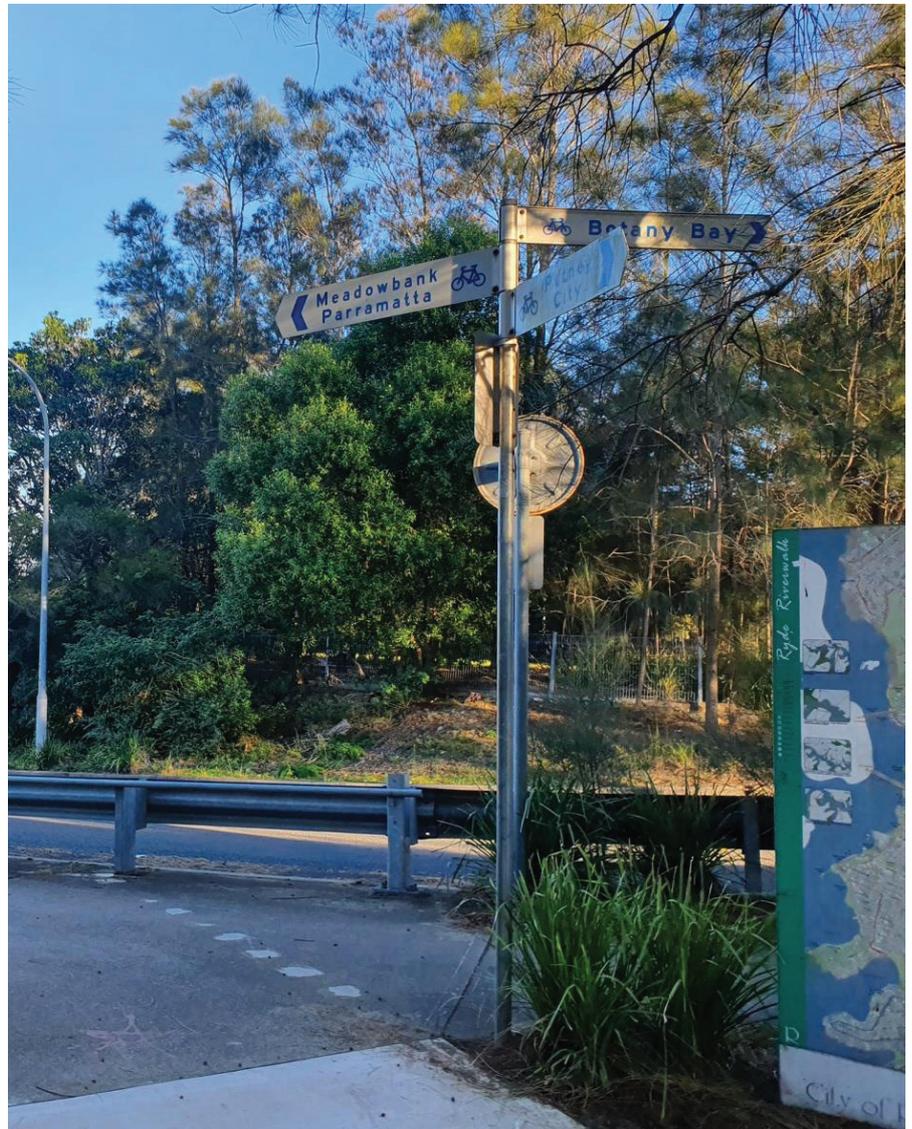
It is also important to ensure streets which form the signed routes provide bicycle facilities that meet a certain level of quality and comfort. This would offer everyone a level of assurance or certainty that the route is rideable all the way.

Today, most of our wayfinding signage promotes routes to major centres outside of the local area. For example, wayfinding signage on Coxs Road promotes trips to North Sydney and the City which will take someone about a 50 minute and 60-minutes bicycle ride.

To capture shorter local trips that serve Ryde, there is an opportunity to add local destination to our network of signs and promote access to our great places. For this example, local destinations could include:

- Macquarie Hospital (2 minutes)
- North Ryde Metro Station (10 minutes).

Wayfinding can also include the branding of key routes or incorporate art to feature our local culture and heritage. This can give our routes an identity and enhance a sense of ownership.



(Figure 35) Wayfinding sign located at Settlers Park heading toward Ryde Bridge.



(Figure 36) A five-minute ride from Meadowbank Station and accessible key destinations that could be promoted and signed.

6 | RYDE EASY



(Figure 37)
Example of a raised zebra crossing with bicycle lanes on Buffalo Road.
Source: Nearmap, August 2021.



(Figure 38)
Example bicycle crossing linking into a separated on-road bicycle facility, Sutherland.
Source: CrossleyTP.

Our Priorities

To make riding, scooting and skating easy and an attractive option for the City of Ryde’s residents, visitors and businesses, Council will:

RE1. Adopt the design criteria to improve the quality and comfort of our existing and proposed bicycle routes.

RE2. Reduce the stress level and improve comfort across the bicycle network by:

- Converting existing parking lanes with bicycle symbols to parking protected bicycle lanes
- Provide bicycle facilities where shared-user paths across intersections, such as bicycle lanterns at signals, bicycle lanes at zebra crossings, wombat crossings or refuge islands
- Install dropped kerbs at road closures to enable riders to filter between streets
- Conducting parking audits to identify certain locations with low levels of on-street parking to install parking protected bicycle lanes on one side of the road.

RE3. Enhance levels of separation between riders and turning motorists at side roads and intersections.

RE4. Develop a City of Ryde wayfinding signage strategy.

RE5. Work with the community and partners to improve safety, access and comfort on existing routes.

RE6. Reach out to local businesses who operate a bicycle courier service to gain a better understanding of existing safety issues and work collaboratively to resolve them.

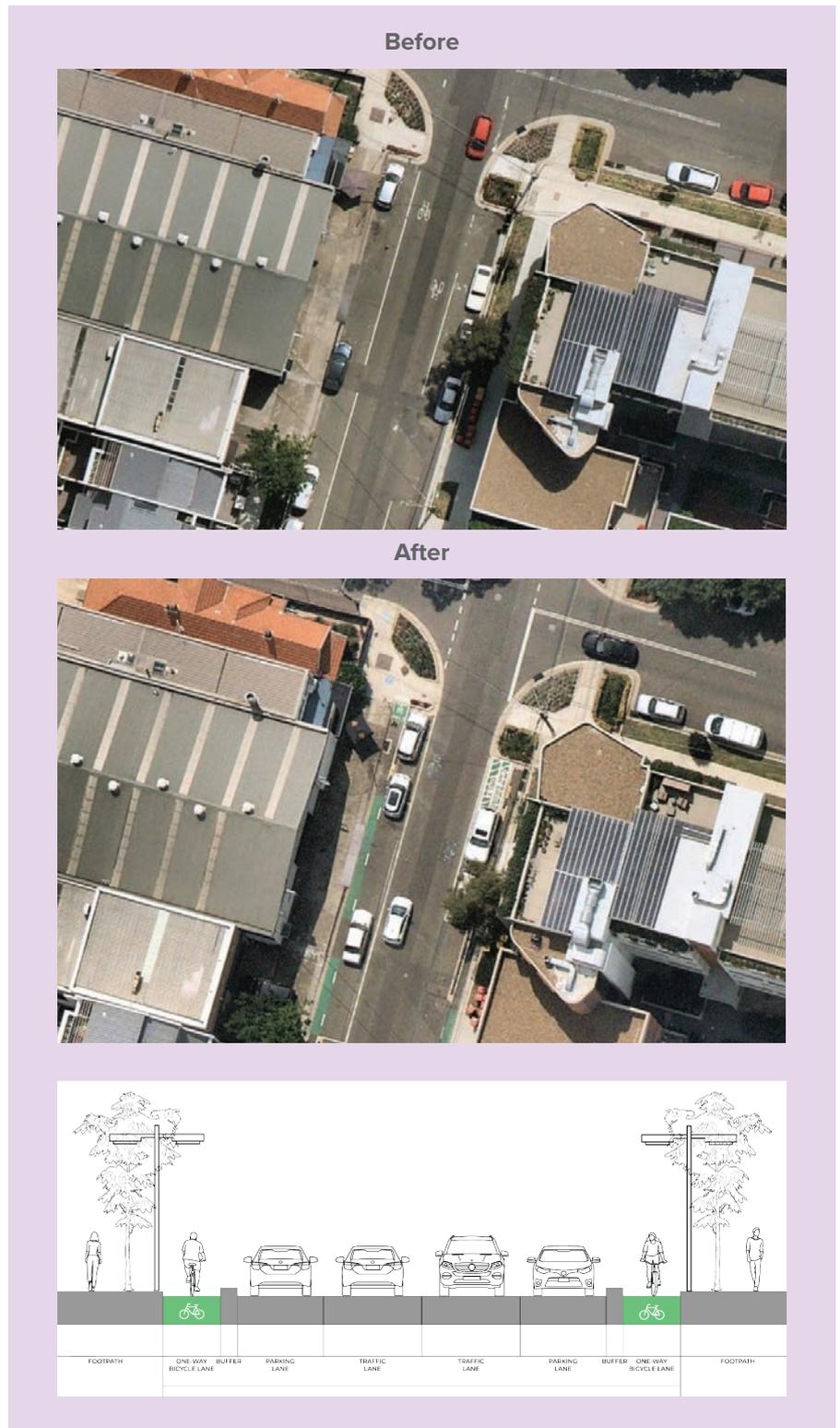
RE7. Advocate and conduct pilot studies with TfNSW to trial 30km speed limits around our schools and villages to improve safety for people walking and riding; and enhance liveability.

RE8. Develop and roll-out a lighting strategy for bicycle routes across the City of Ryde to ensure walking and cycling facilities are well-lit.

RE9. Minimise the conflict between pedestrians and cyclists in popular recreational areas and town centres by separating people walking and riding.

RE10. Implement a Near Miss incident survey for people riding to log any near miss incidents on the road network for Council to consider for future safety improvement works.

RE11. Advocate to TfNSW for amendments to legislation to allow people to ride across signalised pedestrian crossings.



(Figure 39) Example of parking protect bicycle lane at Dunning Avenue, Sydney. A way to make riding easy. Source: Aerial images sourced from Nearmap, cross-section image by CrossleyTP.

7

RYDE
MORE



Footbridge, North Ryde.



(Figure 40)
A ciclovía event in Downtown Los Angeles where streets are open to walking, riding and skating.
Source: CrossleyTP.

Walking and riding everyday

An approach to bring the enjoyment of riding to everyone

Encouraging people to walk and ride more means normalising cycling as an everyday activity and giving people the skills, confidence and tools to ride safely.

This means:

- Breaking down stereotypes of what it means to be a cyclist, and to rebuild a positive public image of what is to be an everyday rider
- Giving people the confidence and skills to ride through education and training programs
- Working with businesses operating bicycle courier services to provide training and education on what it means to be a 'good and safe rider' for themselves and others
- Celebrating riding and support events which promote walking and riding. This can range from Ride2Work days to festivals such as Ciclovía!
- Promoting the opening of new bicycle links
- Giving people access to bikes such as bike libraries or shared service schemes
- Promoting our routes and let everyone know where they can travel to and from by bike.

Case Study 1



Ciclovía is a car free streets initiative where routes of 8-16km are temporarily closed to let people get out, get active and have fun!

The benefits:

- 10 – 57 percent increase in on the day sales for businesses
- 45 percent more people were active
- Public transport ticket sales
- 40 percent drop in local crime.

7 | RYDE MORE



(Figure 41)
Launch event for the Ryde Scooter Track, 2018. Source: City of Ryde.

Our Priorities

To encourage more people to walk and ride Council will:

RM1. Partner with schools, universities, TAFEs, NSW Department of Education, NSW Ministry for Health, and the Heart Foundation to encourage more students and families to walk or ride.

Actions include:

- Implementing cycling participation programs to encourage student and families to ride safely to schools, universities, TAFEs and other educational facilities
- Continue the Go Active 2 School program
- Continue the Transport Access Program and maps illustrating the best walking and cycling routes to school, universities and other educational facilities
- Provide bicycle training and support for parents and guardians who accompany children to school.

RM2. Pro-actively reach out to businesses operating bicycle courier services to support:

- Safer riding and rider-behaviour
- Maximise sustainable transport uptake for business purposes.

RM3. Promote the opening and launch of new bicycle facilities and celebrate our achievements.

RM4. Pro-actively reach out to under-represented sections of the community to consult, engage and encourage them to participate in riding.

- Developing specific riding programs and training events to target this audience
- Partner with community leaders and groups to promote and deliver the programs.

RM5. Assist and provide information for workplaces wanting to set up bike rider encouragement programs, end of trip facilities or bike fleets.

RM6. Work with operators of bike related businesses such as bike share to maximise outcomes for Ryde.

RM7. Provide opportunities and educational programs for people of all ages and all abilities within the City of Ryde to build skills and confidence in cycling and safe practices.

RM8. Improve access to bikes by collaborating with bike share services, bicycle library schemes and promoting grant opportunities.

RM9. Evaluate and monitor participation and perceptions of riding in the city, and the success of education and promotional campaigns.

We shall partner with key stakeholders to develop a bicycle survey or bicycle count program. This will help us understand who is and who is not riding in our city and why.

RM10. Invest in programs which promote participation from all abilities. For example, offering wheelchair bikes to enable wheelchair users and family, friends or volunteers to experience riding together.

RM11. Provide complementary infrastructure and assets along major bicycle routes and in town centres to encourage more riding. For example, installation of bicycle parking, public bicycle repair stations with tools/pump, filtered water stations, access to public toilets and rest stops (eg. parks or cafes).

RM12. Council will continue to investigate options for establishing bicycle tracks specifically for children within parks, as well as BMX/mountain bike tracks. This will be undertaken as part of masterplanning activities for major parks and park upgrades, subject to site suitability and environmental assessment (where required). This will enable greater recreational opportunities for these members of our community.



(Figure 42)
Integrating art and culture – Eastwood Pedestrian Underpass Reopening, 2019.
Source: City of Ryde.

8

RYDE
AHEAD



Leading the way

To achieve the vision for Ryde, commitment, ambition and strong leadership will be required from community leaders, partners and government bodies.

Our approach

Council's role is to lead in the design and delivery of bicycle infrastructure, secure investment and build effective partnerships with our neighbouring councils, government agencies and communities. Council will adopt innovative and creative approaches to solve complex problems and build capabilities amongst leaders and Council Officers.

Piloting temporary treatments to permanent installations

The key challenge to delivering bicycle facilities is limited funding streams and lengthy approvals and construction timescales.

Temporary and interim design strategies provide the tools and tactics to implement bicycle facilities almost immediately. They involve low-cost construction materials and simpler construction methods which together enable faster delivery at better value for money.

The opportunity to deliver infrastructure fast, will reduce disruption and disturbance caused by construction to our communities, such as lane closures or night-time works.

The temporary nature of such schemes also provides an opportunity to test, experiment and experience the design. The benefit is an ability to make adjustments and develop the facility to a permanent piece of infrastructure over time.



(Figure 43)
Businesses adopting bicycle courier services.
Source: CrossleyTP.

8 | RYDE AHEAD

New Technology

The number of ways a person can choose to travel is increasing with new technologies. The addition of electric power to bicycle and scooters is making personal mobility attractive and accessible to more and more people.

To capture the benefits and potential ridership, our infrastructure will need to be flexible and responsive to the changing needs and demands driven by new technology.

Taking a multi-use approach could add resilience to our assets and investments such as enabling E-charge stations to cater for both cars and E-bikes; and bike parking that can be used for bikes and scooters.

Technological advancements also include construction methods and materials. In addition to pop-up and temporary measures, this includes re-using waste products such as plastics.

The Clive Bridge shared path is the first bridge built from recycled plastic. The shared user path located in Hastings, New Zealand is constructed from lightweight plastic pavers made from more than four million plastic bags.



(Figure 44)
A concept for a protected solar powered E-bike parking corral, Austria.



(Figure 45)
Solar-powered E-bike charging stations, France.

Our Priorities

To ensure continuity in innovation in the delivery of walking and cycling infrastructure, Council will:

RA1. Lead by example and encourage Council employees to ride to work and for business trips such as:

- Setting up an E-bike fleet for Council employees to use for business trips
- Developing a Green Travel Plan for Council operations.

RA2. Identify potential opportunities to pilot bicycle designs and routes using temporary treatments and measures.

RA3. Support and develop new approaches for the allocation of street space.

RA4. Support research into new bicycle design and construction materials. This includes opportunities to incorporate waste materials such as plastics and glass to reduce our environmental impact and carbon footprint.

RA5. Broaden representation on our Bicycle Advisory Committee to include leaders in health, education, environment, business and community services. There is also an opportunity to launch a Council Youth Panel and include a member onto the Bicycle Advisory Committee.

RA6. Advocate for better and more bicycle parking facilities at ferry wharfs, bus, train, and metro stations.

RA7. Council to consider governance framework and arrangements to support alignment to policies, strategies as well as fostering a ‘one government’ approach to delivering an integrated transport network with consideration for short-, medium- and long-term projects and implementation priorities.

RA8. Council to consider new and emerging bicycle and mobility devices and technologies and consider provision for emerging devices. For example, implementing bicycle charging stations at key locations throughout the City of Ryde for e-bikes.

RA9. Council to develop a funding strategy to secure investment to deliver new bicycle connections, education and training programs.

9

MEASURING SUCCESS



(Figure 46)
Innovative bicycle hub with CCTV, carded access and tools for bicycle repairs, Enfield, UK.

Success will be measured against progress against the following goals in providing:

- Better (low stress) bicycle facilities
- Continuous connections to and from centres
- Attracting more people to ride and more often
- Participation in riding reflects the diversity of the community.

Council will measure progress against these goals by:

Connect Ryde

- Measure the number of kilometres of bicycle facilities delivered
- Measure the proportion of regional bicycle connections delivered
- Measure the proportion of households located within 200m of a bicycle facility.

Ryde Easy

- Report on the proportion of low stress bicycle facilities within the bicycle network
- Measure the level of safety and comfort perceived by users
- Monitor the number of bicycle related crashes and near miss incidents in the City of Ryde.

Ryde More

- Monitoring the number of people riding before and after the implementation of a new bicycle facility
- Monitor how frequent people have cycled in the past year, month, week and their purpose for their cycling trip
- Monitor the proportion of children who walk and ride to school
- Monitor usage of bicycle parking facilities and types of bikes present
- Survey the diversity of riders (gender, age, ability, skill level/ confidence)
- Report on the implementation of cycle education programs and initiatives
- Record the number of bicycle racks, lockers, repair stations and filtered water stations.

Setting Targets

The Local Strategic Planning Statement sets out ambitious targets for 2028. This bicycle strategy will contribute towards the following targets:

- 40 percent of people will walk, ride or catch public transport to and from work
- By 2050 there will be a net zero carbon emissions across the City of Ryde (carbon neutral)
- Safer town centres for people walking with safer road crossing points, reduced speed limits and improved lighting
- Improved access to public open space in the City of Ryde providing an extended network of recreational corridors, links and connections running through the City of Ryde.



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 City of Ryde

Lifestyle and opportunity
@ your doorstep

