Thank you for allowing me to present.

- My name is Glennys Jones
- I am a member of the Boroondara Bicycle Users Group and a Bicycle Network Life Member
- I have ten years experience as a Bike Ed Instructor and Austcycle teacher.
- Since 2009 I have participated in Boroondara Councils Trail Safety Audits, including Koonung Creek, Yarra and Anniversary / Outer Circle Trails
- I was a member of the NEL CTDG walking and cycling group, a rare female participant.
- My presentation is by no means an exhaustive list but just a couple of concerns that can be addressed in the allocated time.
It is often said that females are the “indicator species” when it comes to cycling, only visible when infrastructure evolves to an acceptable standard.

However, the true indicators when it comes to walking and riding are children. When infrastructure fails to meet the needs of children, we fail them.

Children and the elderly have slower walking speeds than the VicRoads default adult walking speed used to trigger traffic light changes, these vulnerable road users are frequently still on the roadway when the vehicles are given the green light.

Pedestrian sensing radars are available and can be incorporated into crossings but rather than being adopted as best practice, they are seen as potentially disrupting the traffic flow, they tend to be installed retrospectively in response to recommendation of the coroner.

The Austroads Guides for cycling are based on competent, able body adult riders, they frequently fall short when considering the requirements of children, most of them are novices, of shorter stature. Too frequently there are radii on ramps and bends that fail to recognise that bikes have a “self stable speed” and forcing novice rider below that speed whilst attempting complex manoeuvres in restricted spaces, place these users at considerable risk.

We can do better.

Poor planning and engineering has created the invisible child and “mad mother hour”. It’s that peak that exists during the school term where parents are forced to drive their kids to and from school because our road designers suffer from a “windscreen bias”, putting cars before people.
25km of shared paths being delivered with NEL sounds impressive until you drill down to the detail.

Of the 25kms of cycling paths to be delivered most of it is:
• reinstatement of paths destroyed by NEL and
• long overdue upgrades of substandard and neglected VicRoads paths along the freeway corridor (as documented in the Trail Safety Audits).

There is very little that’s new and the “out of scope card” has been played at every opportunity to avoid delivering strategic connections.
• Complex multi-staged crossings create a pedestrian hostile environment
• This example is the Chandler Highway crossing of the Eastern Freeway.
• The papermill development to the immediate north is being designed to encourage cycling and will see 6000 new residents, combined with Chandler Hwy upgrade paths there will be an increase in north south demand
• The Fairfield Spur line, is a northern section of the Outer Circle trail a new shared path is gaining traction, it will further increase north south travel demand.
• The Outer Circle / Anniversary trail “shared path” crossing the freeway just 2m wide and will cross 8 traffic lanes within 275m, the lanes will double from 4 to 8 and this will result in reduced pedestrian refuge / splitter island size, making them too small to be used by families, groups and some disabled users.
• Users must press and wait at four traffic signals within that 275m, this is a major deterrent and provides a poor level of service to pedestrians and cyclists
• There is a bike lane painted on the highway but this is only suitable for the most experienced riders and with the introduction of the new river bridge, the traffic is moving faster, making cycling on a highway even less appealing. Paint provides zero protection from distracted drivers.
• A new separated freeway crossing for pedestrians and cyclists is required at the Chandler Hwy across the Eastern Freeway to connect the Outer Circle trail (Strategic Cycling Corridor) to the NEBC and the Chandler Hwy upgrade shared paths.
• This crossing sits within the NELP footprint, there are economies of scale designing and delivering it as an integrated solution within the project scope and futureproofing this Strategic connection.
Despite the Victorian Cycling Strategy and the Transport Integration Act, the “out of scope” card has been played to avoid delivering connected functional infrastructure. This has resulted in a Reference Design that falls well short of the aspirations espoused by this project.

The City of Yarra has developed sections of separated cycling paths for cyclists accessing the CBD. Many of the NEBC users, including novice riders, will be heading to the CBD. The scope of the reference design stops short of delivering a great cycling corridor, it needs to be extended to ensure there are connections to the separated bike lanes and that the bridge crossing has the capacity to handle the increased number of users.
Micromobility is the sweat free, lycra free, toll free, car park free transport option.

Australia is expected to follow the international trends in the uptake of micromobility.

Advances in compact lightweight motors and long lasting batteries have created a real game changer for personal transport and numbers of them are increasing on the shared path networks, this is expected to grow.

E-scooter are achieving ranges of 60kms – with prices starting at the equivalent of a years car registration - [https://electricscootering.com/electric-scooter-range/](https://electricscootering.com/electric-scooter-range/)

NEL has completed vehicle modelling out to 2036, micromobility modelling needs to be performed to ensure they future proof the shared path network to cater for the growth in cycling and the expected rapid uptake of micromobility.
I am opposed to the NEL Tennis Centre proposed relocation to Musca Reserve.

It will have adverse effects on the shared path infrastructure and more importantly on the broader environment.

There are two preferred proposal for the tennis centre which warrant consideration that provide greater amenity and lower environmental impact.

1. The BBW NEL Eastern Freeway alternative design for the Bulleen interchange (Tabled documents 28) retains the tennis courts in their existing location.

2. The relocation to the Freeway Golf course creates a sporting precinct and delivers economies of scale in terms of shared club house facilities, access roads and car parking.

By contrast the NELA proposal duplicates the facilities and consumes a significant portion of passive open space, it increases the paved surfaces in the park by creating a circuitous detour in the Koonung Creek trail, totally negating the short detour path being provided on the northern section

Keeping the facility close to the current location has merit, it:
• best serves the communities using the centre.
• Creates a sporting precinct close to the private schools sporting fields
• Achieves a smaller footprint by avoiding duplication of services.
The Yarra trail is a vital north south link between Boroondara and Heidelberg. It is a Strategic Cycling Corridor. Whilst it is currently unsealed, many riders, myself included prefer this path as a more direct option than riding alongside a busy road as proposed along Bulleen Road with it’s many road crossings and traffic lights. The current crossing arrangements are not satisfactory, the steep corkscrew is unrideable by many riders, I walk it. It is not DDA. The pedestrian crossing is multi staged and the splitter islands are too small to cater for groups of users, families and some disabled users.

Delivering this as a Complimentary project will provide a safe separated all ages and ability crossing.
SUMMING UP

- Liberate kids from car
- Prioritise safe low stress infrastructure that encourages walking and cycling – all ages and abilities
- Future proof shared paths and connections to provide for the increase in demand associated with micro-mobility
- Preserve Musca Reserve as passive open space – not a tennis centre
- Review / extend the scope of the North East Bicycle Corridor (NEBC) in the City of Yarra and at the Chandler Hwy to ensure this Strategic Cycling Corridor is functional and connected
- Deliver Banksia Road underpass as a complimentary project
APPENDIX

“Cycling Infrastructure – the good, the bad and the ugly” Presentation to the ITEANZ at RMIT in 2018

- NEL CTDG Walking and Cycling asked us in our first session to present examples of good and bad cycling / shared path infrastructure that we’ve come across
- I subsequently presented it to the ITEANZ and hope that the contents might be of interest to the panel.
BICYCLE INFRASTRUCTURE
The Good, the Bad and the Ugly
Glennys Jones
EXAMPLES OF “BAD”

▶ If these issues were on roads they would have been fixed years ago

▶ Yet cyclists and pedestrians are expected to accept poor design and poor maintenance as the norm

▶ Some of these photos are in the North East Link project area, Let's hope they fix them
Steep gradients can be a significant barrier to riding. The hill was cut out for the cars but not for cyclists who have to ride up and over.
When lines are drawn on maps through an inundation zone, without reference to river height data, we end up with paths that flood and become unusable.
300m from $110m Chandler Hwy upgrade, access is denied to many users because of traffic lights in middle of shared path.
When paths are already narrow, caging them in with freeway sound walls doesn’t make them more attractive – can have similar effect to tunnels.
ENCROACHING VEGETATION

**PLAN when planting**

- Path narrowed
- Line of sight reduced
- Perception of personal safety reduced

Overgrown vegetation can adversely effect a riders perception of personal safety
CRACKING, HEAVING AND ROOT HUMPS

Maintain the paths
Riders are distracted by negotiating in-path hazards when their focus should be on the road. Creates a point of conflict by obstructing half the path and a single track across the roadway.

The palings obstruct line of sight for wheelchair, recumbent users and children of lower stature.
Bicycles are “self stable” at 14km/h and above, switchbacks force riders below that speed. Many riders do not have the slow riding skills to ride below the self stable speed, all this in a confined point of conflict with riders frequently crossing the centreline. Line of sight is problematic for riders of low stature (recumbants and wheelchairs) and children.
Uneven pram ramps, such as blue stone, make for a very uncomfortable ride.
These are extremely uncomfortable to ride and can become dangerous, not the sort of thing you want to ride every day.
POOR DESIGN & POOR MAINTENANCE

Plan stable adjoining surfaces

Mulch migrates onto path with rain and bird activity creating an unstable walking and riding surface.

Unstable embankment results in slurry and debris accumulating on path.
If you want a runway, install solar studs, if you want riders to feel safe with effective lighting then give them a miss.
Sawn joint paths provide a smooth enjoyable ride, if we want people to ride then a smooth surface is important.
Waiting 3 min at a beg button for a cyclist averaging 20km/h is equivalent to adding 1km to the travel distance.

Five traffic lights can add an equivalent of five km’s effective travel distance.
Enough of the bad and ugly now for some good stuff
Crossing highways and busy roads can be barriers to cycling, a well designed over pass can extend the ride and fill the missing links
I love this bridge. 4m wide and well lit makes you feel safe when riding at night.
If you can't go over the barrier then going under can be the answer, Tunnels need to be lit 24/7 and mural before the taggers claim it.
Berkeley University has a lot of international students and encourage cycling, not being familiar with the area (or riding on the right side) these little touches were very encouraging for riders.
This crossing connects to the train station, shops and nearby schools. It was steep, and the vegetation obscured the line of site of road and path users. Drivers must now give way to path users and the path has been raised to provide a smooth and efficient crossing of the road. This path is now very popular with families on the weekend.
The drivers perspective of the reverse priority crossings, cyclists are finally being given the status of vehicle.
Everyone wins with good infrastructure – all ages and abilities
This is a very simple measure but improves ridability, particularly for novice riders.
The path sensors at this intersection are fabulous, it detects your bike approaching and triggers the signals. If it doesn’t detect your carbon fibre bike or you’re walking and you have to press the Beg Button, it is a very short wait to cross.
The Green Wave is set to 21km/h which allows most riders to benefit from the synchronised lights whilst also allowing for San Francisco’s undulating terrain.
These lights LED were very effective at alerting drivers to the presence of pedestrians and cyclists.
The shared path to the Golden Gate Bridge has the pedestrians on the bay side of the path – this allows them to regularly stop for views of the bridge and Alcatraz without crossing the cyclist path.

There is an elevated viewpoint to the left of this photo and they have incorporated a pedestrian crossing point to encourage pedestrians to cross at that point, and to raise cyclists awareness of pedestrians likelihood to cross.

The path splits at the bridge with the pedestrians channelled down the city (bay) side of the bridge, allowing them to gain a view, whereas cyclists, both tourists and commuters travel along the west (ocean) side of the bridge.

Both examples use colour differentiation for the pedestrian path.
SHARING THE PATH

Safe behaviour is everyone's responsibility

San Francisco
The Wiggle is a “shimmy”, a residential greenway which guides riders from the bay to the coast whilst avoiding San Francisco’s infamous hills.
Some paths can feel very isolated so providing signage to facilities nearby can be reassuring.
Large green sharrow is placed within the crossing to alert drivers to look for bikes and remind cyclists they have entered an intersection. Place bike logos outside of the crossing at either side, where drivers do not see them are useless. Sharrows must be in the line of sight.
Signs on poles are often out of the peripheral vision – putting up signs to tell the pedestrians to keep to the left can be overlooked. The separated path above is created with a line of paint and logos. Pedestrians walk to the look out and back to their cars without having to cross the cyclists paths.
Most people are familiar with the Capital City Trail logo - you don't need a map, good wayfinding encourages riding into new and unfamiliar territory.
COUNTERS

Count people, Not just bikes.

Statistics help to justify infrastructure but without counting pedestrians, we’re only getting part of the big picture.

Pedestrians are the silent partners – let’s count them too.
When my boys were learning to ride we rode from playground to playground. It’s the little comforts and amenities that can get and keep us cycling.