



An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

RSTG Conference 2023 16th May - Day 1 Session Begins at 9.40am

Session 1- Active Travel Considerations

Chair Tom Brennan

09.45-10.05	Section 38 of Road Traffic Act	John McCarthy - DoT & Joe Seymour - NTA
10:05-10.25	Cycle Design Manual	Joe Seymour - NTA
10.25-10.45	National Cycle Network	Richard Bowen - TII



Join the Q&A session at [Slido.com](https://www.slido.com) and enter 5812867
Or via the QR Code





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

LOCAL AUTHORITY ROADS CONFERENCE and EXHIBITION – 2024

Day 2-Session 1-Presentation 1

Section 38 Road Traffic Act (Traffic Calming – Traffic Works)

John McCarthy
Senior Advisor
Department of Transport

Joe Seymour
Head of Active Travel Investment
National Transport Authority





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

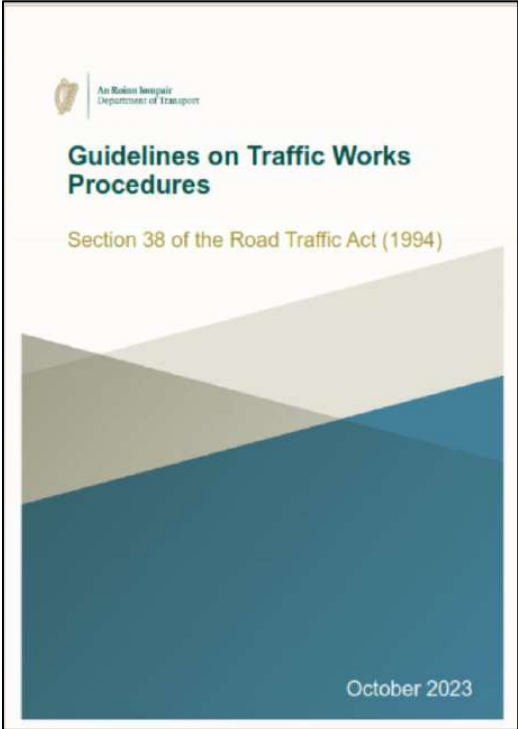
LOCAL AUTHORITY ROADS CONFERENCE 2024

Section 38 Road Traffic Act (Traffic Calming – Traffic Works)

John McCarthy
Department of Transport

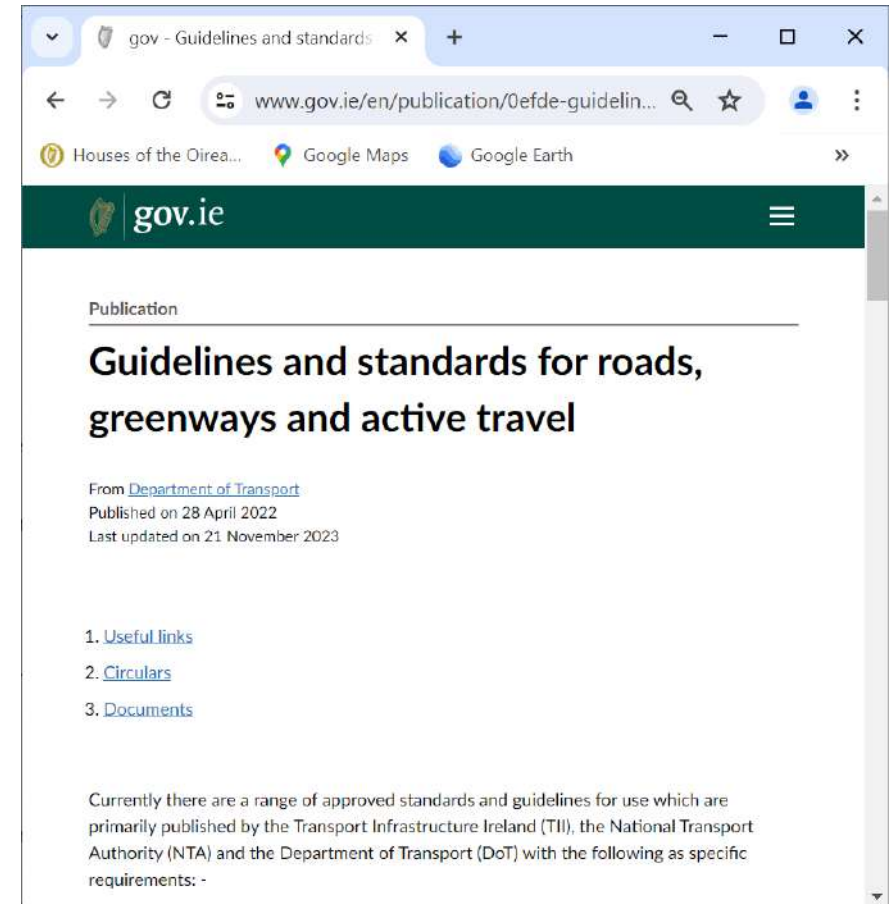
Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

- Circular NGS 3 of 2023 - 12th October 2023
- Statutory Guidelines
- In accordance with Section 38 (6) of the Road Traffic Act, 1994, as amended, apply to all works undertaken under that Section.



Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

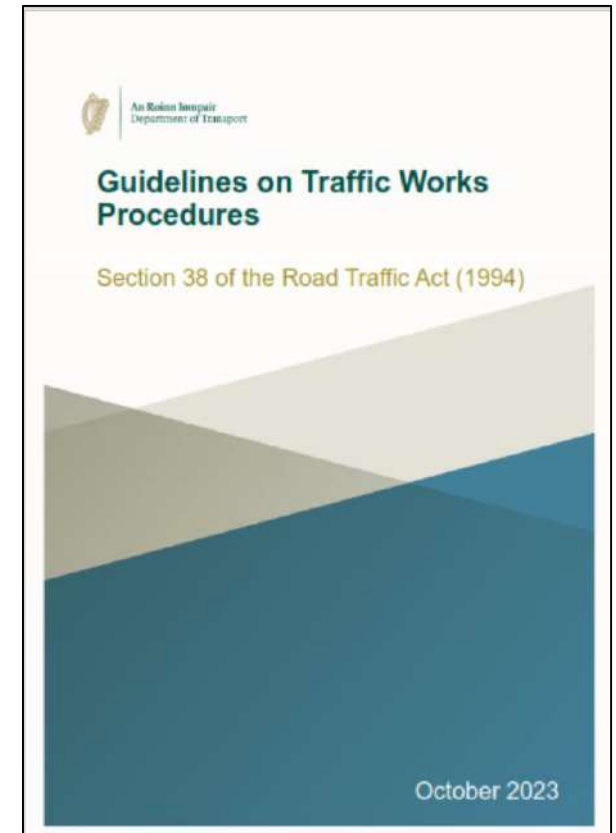
- Issued by the National Guidelines and Standards Group
- Roads, Greenways and Active Travel
- Oversight and co-ordination of **all** guidelines and standards to be used on the Road Network
- Overarching requirements to the use of Standards and Guidelines
- Quality Procedures (Audits, Certification etc.)
- National listing of all Guidelines and Standards in use



Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

Guidelines are designed to: -

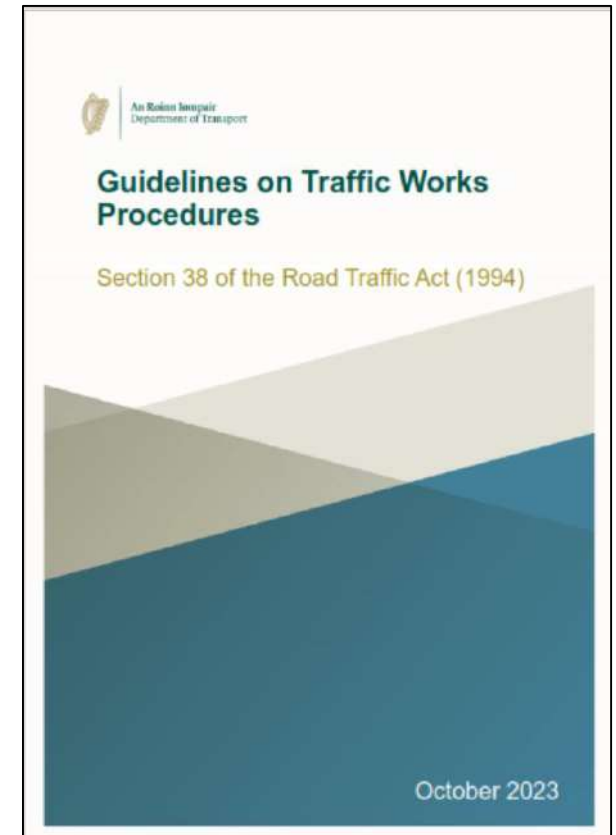
- Set appropriate limitations to the use of Section 38 based projects/works
- Ensure a standardised approach to such projects/works
- Ensure that proper Governance procedures are in place including the use of Traffic Works Orders (CE Orders)
- Ensure appropriate levels of consultation with Public and Elected members and Stakeholders
- Pilots similar to UK Experimental Traffic Orders



Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

The attached Guidelines set out:

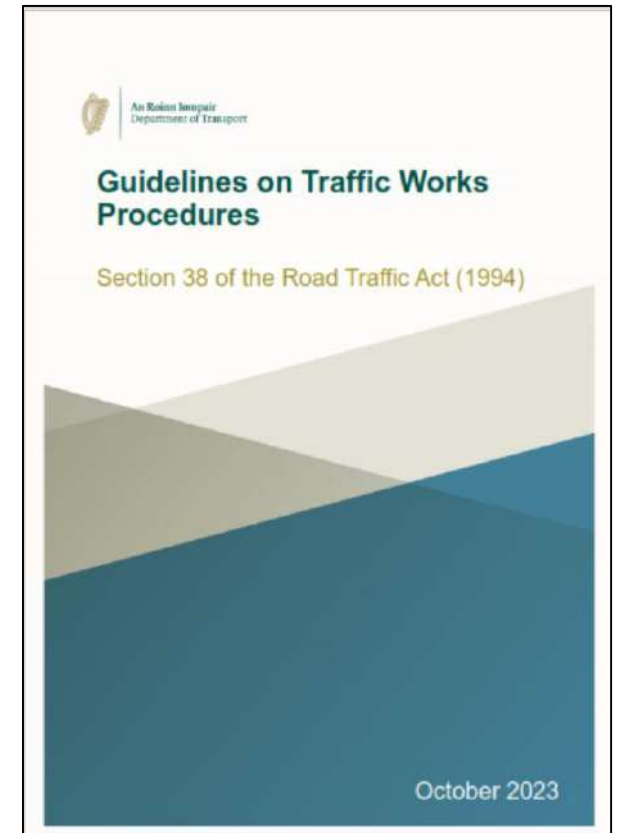
- Types of measures which fall under Section 38, such as reallocation of street space, provision of bus lanes, etc.
- Section 38 and its interaction with the Planning Process.
- Determining appropriate procedures for schemes which fall under Section 38.
- Standard Procedures to be adopted under Section 38 including 'Traffic Works Orders', and
- Trials Procedures to be used in accordance with Section 38 including 'Temporary Traffic Works Orders.



Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

Section 38 - Traffic calming measures.

A road authority may, in the interest of the safety and convenience of road users, provide such traffic calming measures as they consider desirable in respect of public roads in their charge.



Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

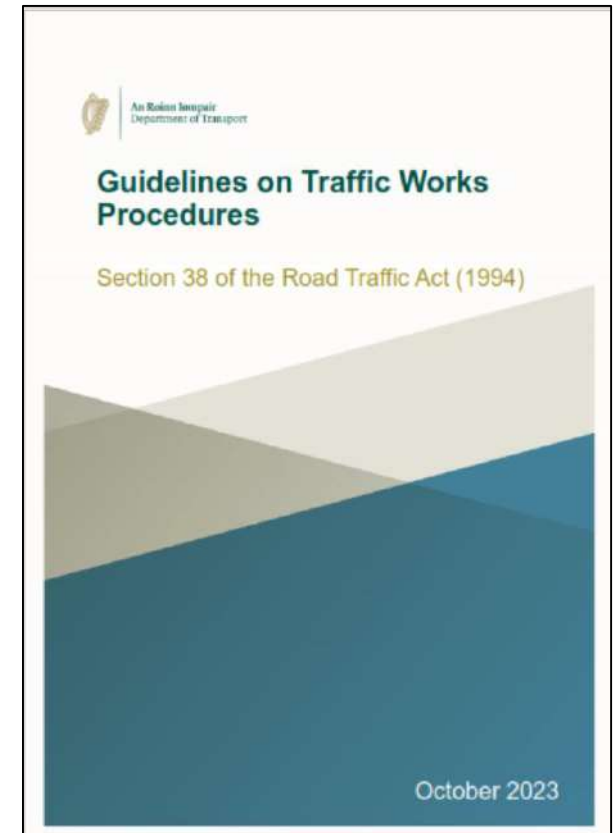
Scope ... broad

"Traffic calming measures" are defined in Subsection (9) of Section 38 as meaning:

"measures which —

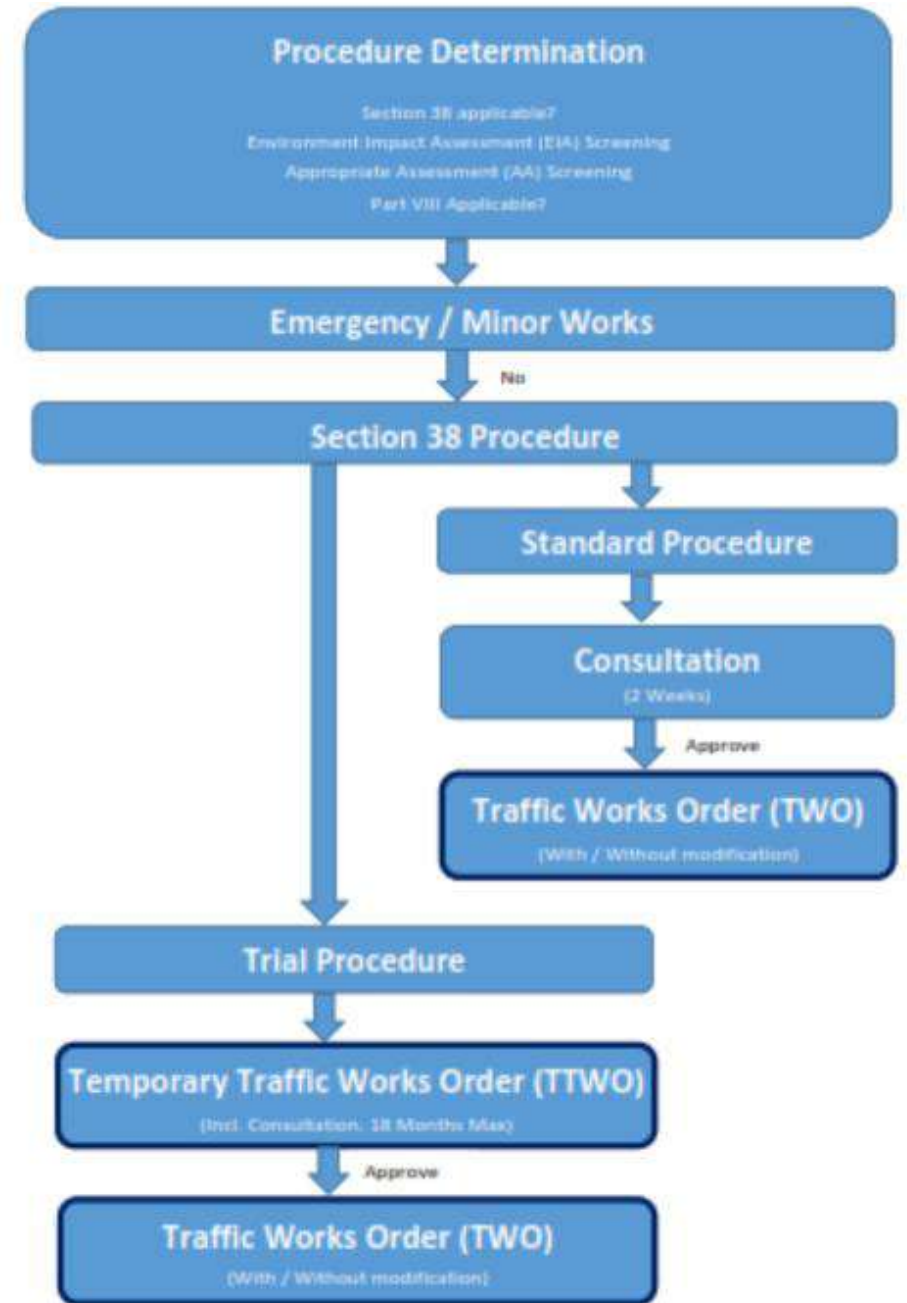
- (a) enhance the provision of public bus services, including measures which restrict or control access to all or part of a public road by mechanically propelled vehicles (whether generally or of a particular class) for the purpose of enhancing public bus services, or*
- (b) restrict or control the speed or movement of, or which prevent, restrict or control access to a public road or roads by, mechanically propelled vehicles (whether generally or of a particular class) and measures which facilitate the safe use of public roads by different classes of traffic (including pedestrians and cyclists),*

and includes for the purposes of the above the provision of traffic signs, road markings, bollards, posts, poles, chicanes, rumble areas, raised, lowered or modified road surfaces, ramps, speed cushions, speed tables or other similar works or devices. islands or central reservations. roundabouts. modified junctions, works to reduce or modify the width of the roadway and landscaping, planting or other similar works."



Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

Procedure Flow Chart



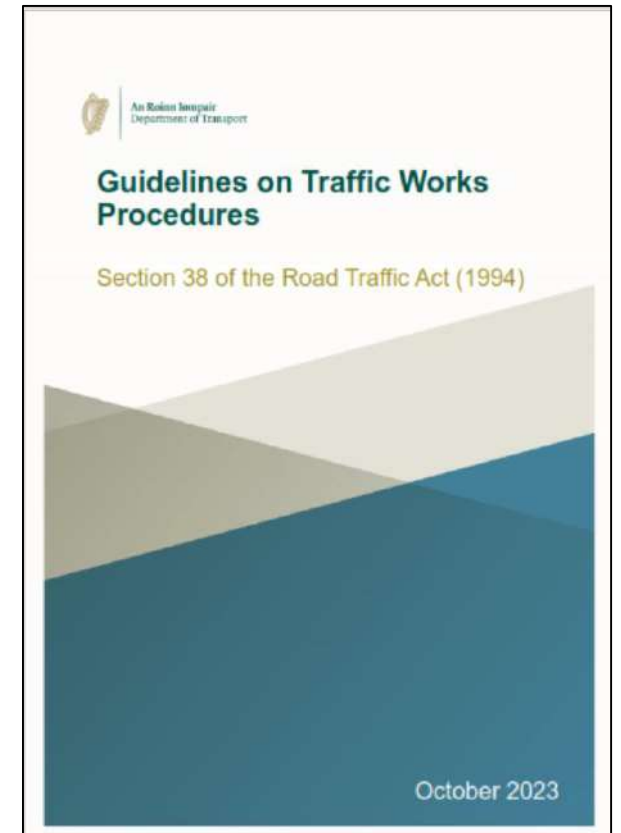
Section 38 Road Traffic Act Guidelines (Traffic Works Procedures)

Note: -

Traffic calming measures shall not be provided or removed in respect of a national road without the prior consent of the Transport Infrastructure Ireland.

Guidelines: -

- Potential to develop procedures further
- Welcome data and feedback
- Role and benefits of Pilots





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

Thank You

John McCarthy
Department of Transport
John.mccarthy@transport.gov.ie

What is Section 38?

Provision or removal of traffic calming measures by a local authority *“in respect of public roads in their charge.”*

Traffic calming measures” are defined as:

“measures which —

- a) enhance the provision of public bus services, including measures which restrict or control access to all or part of a public road by mechanically propelled vehicles (whether generally or of a particular class) for the purpose of enhancing public bus services, or*
- b) restrict or control the speed or movement of, or which prevent, restrict or control access to a public road or roads by, mechanically propelled vehicles (whether generally or of a particular class) and measures which facilitate the safe use of public roads by different classes of traffic (including pedestrians and cyclists),*

and includes for the purposes of the above the provision of traffic signs, road markings, bollards, posts, poles, chicanes, rumble areas, raised, lowered or modified road surfaces, ramps, speed cushions, speed tables or other similar works or devices, islands or central reservations, roundabouts, junctions, works to reduce or modify the width of the roadway and landscaping, planting or other similar works.”

Critical Criteria 1

Identify the scope and key details of the proposal and assess whether they constitute traffic management measures within the definition set out in Section 38

- Roadway alterations to enhance safety,
- Re-allocation of street space,
- Junction enhancement schemes to improve safety,
- Filtered permeability / filtered one-ways,
- Provision of bus lanes and bus gates,
- Bus facilities such as lay-bys, accessible bus stops and bus shelters.
- Construction or enhancement of footpaths,
- Pedestrianisation of sections of public roads,
- Construction of pedestrian and/or cycle crossings,
- Installation of cycle tracks,
- Cycle facilities, such as cycle stands, bike stations or bike parking.

Critical Criteria 2

Determine if the proposed scheme is to be undertaken on a public road or public roads and does not extend outside the boundaries of the public road(s).



Must be on or within the boundaries of a public road.

Definition of a Road?

The Roads Act 1993 defines a “road” as including:

- a) *any street, lane, footpath, square, court, alley or passage,*
- b) *any bridge, viaduct, underpass, subway, tunnel, overpass, overbridge, flyover, carriageway (whether single or multiple and whether or not designated for a particular class of vehicle), pavement or footway,*
- c) *any weighbridge or other facility for the weighing or inspection of vehicles, toll plaza or other facility for the collection of tolls, service area, emergency telephone, first aid post, culvert, arch, gulley, railing, fence, wall, barrier, guardrail, margin, verge, kerb, lay-by, hard shoulder, pedestrian refuge, median, central reserve, channelliser, roundabout, gantry, pole, ramp, bollard, pipe, wire, cable, sign, signal or lighting forming part of the road, and*
- d) *any other structure or thing forming part of the road—*
 - i. *used, or the use of which is reasonably required, for the safety, convenience or amenity of road users or for the construction, maintenance, operation or management of the road or for the protection of the environment, or*
 - ii. *prescribed by the Minister.*

Critical Criteria 2



Park?



Areas not taken in charge?

Where the intended intervention is **Not** being implemented in full on a public road, Section 38 is **Not** the applicable empowering provision.

Planning Process

Section 38 empowers a local authority to carry out certain works in accordance with the provisions of that section. However, by itself it does not remove the requirement to comply with planning consent legislation. Where an EIA is not required the appropriate process to be followed is the Part 8 procedure which covers most things on a road, however there are exemptions:

works, other than works involving road widening, to enhance public bus services or improve facilities for cyclists provided under section 95 (as amended by section 37 of the Road Traffic Act 1994) of the Road Traffic Act 1961 or under section 38 of the Road Traffic Act 1994

Planning Process

It is important to note that other works proposed to be implemented under Section 38, which are not for the purposes of enhancing public bus services or improving facilities for cyclists, will require approval under the Part 8 procedure, unless exempted under another provision, such as the exemption for certain works below a certain value, which is currently €126,000.

It is also important to note that the exemption is qualified to relate only to works “*other than works involving road widening*”. Accordingly, where the proposed works include road widening, this exemption does not apply.

Critical that you understand where the boundary of the road is located.

EIA and AA Screening

Central to the decision as to whether an additional development consent process is required, is the determination of the need for Environmental Impact Assessment or Appropriate Assessment.

This will assess whether the scheme can be approved by the Local Authority or will have to be submitted to An Bord Pleanála for consideration. To aid in the screening process the NTA has recently published a guidance document.



1**Projects in Annex I of the EIA Directive / Schedule 5 Part 1 of the 2001 Regulations****See Appendix A parts 1 and 2**

- **EIA is mandatory in respect of projects listed in Annex I of the EIA Directive.**
- In the context of Active Travel Initiatives, all of the categories set out in Annex I to the EIA Directive and Part 1 of Schedule 5 to the 2001 Regulations must be considered.
- Certain types of "road development" also require mandatory EIA, as set out in the 1993 Act and 1994 Regulations and discussed on page 16 (see Call-Out Boxes 1-3).

2**Projects in Annex II of the EIA Directive / Schedule 5 Part 2 of the 2001 Regulations (above threshold)****See Appendix B parts 1 and 2**

- **EIA is mandatory in respect of projects listed in Annex II of the EIA Directive which equal or exceed a specified threshold** (See Appendix B Part 1).
- Those thresholds are again set out in Part 2 of Schedule 5 to the 2001 Regulations (see Appendix B Part 2), with thresholds in relation to "road development" set out in the Roads Act 1993 and Road Regulations 1994 as discussed on page 16 (see Call-Out Boxes 1-3).

3**Projects in Annex II of the EIA Directive / Schedule 5 Part 2 of the 2001 Regulations (sub-threshold)****See Appendix B parts 1 and 2**

- **Projects which are listed in Annex II to the EIA Directive but which do not meet or exceed certain thresholds must be subject to EIA Screening** (see Appendix B Part 1).
- Those thresholds are set out in Part 2 of Schedule 5 to the 2001 Regulations (see Appendix B Part 2).
- Thresholds in relation to "road development" are set out in the 1993 Act and 1994 Regulations as discussed on page 16 (see Call-Out Boxes 1-3).

EIA Screening

- Screening is to be carried out by reference to the information and criteria set out in Annexes IIA and III to the EIA Directive (as transposed in Schedules 7A and 7 to the 2001 Regulations respectively) (see appendices D and E). If it is concluded that the project is likely to have significant effects, or if significant effects cannot be ruled out, an EIA is required.
- See Part 3, page 20 of this guidance in relation to carrying out the EIA Screening process.

**EIA Screening Required**

If "screened in"

**EIA Required****Notes**

- While a "project" only requires EIA where it falls within one of the categories of projects set out in the Annexes, the Irish and European courts have taken a wide view of those categories.
- The Annexes often refer to sectoral categories of projects, without describing the precise nature of the works provided for.
- Therefore, the proposer of an Active Travel Initiative needs to carefully consider the various projects that are listed in Schedule 5 to the 2001 Regulations and consider if what they are doing potentially falls within any of these categories of "projects".
- All categories of projects must be considered. In practice, the category of project in Schedule 5 to the 2001 Regulations that appears to be potentially the most relevant to certain types of Active Travel Initiatives is "urban development", which appears under the heading "Infrastructure Projects" in Class 10 of Part 2 of Schedule 5 to the 2001 Regulations.
- See page 13 of this guidance for guidance in relation to when EIA is required for "urban development".
- A local authority should also consider whether an Active Travel Initiative might fall within Class 13(a) or (c) of Schedule 5, which relate to changes or extensions to developments which have already been authorised.

Note

Where an Active Travel Initiative falls to be considered as "road development" under the Roads Act 1993, there are separate EIA Triggers for "road development" as discussed on page 16 of this guidance.

EIA Screening

- i. the construction of a new road of four or more lanes; OR
- ii. the realignment or widening of an existing road so as to provide four or more lanes;
- iii. where such new, realigned or widened road would be >8km in length in a rural area, or >500m in length in an urban area.

If either (i) or (ii) above is satisfied, and the Active Travel Initiative exceeds the length thresholds in (iii) above, then an EIA is automatically required.

The construction of a new bridge or tunnel which would be >100m in length, then an EIA is automatically required

Determinations

Once the EIA Screening report has been prepared a formal EIA Screening Determination must be made by the Competent Authority.

This is a separate document prepared by the Competent Authority (which in relation to EIA Screening for active travel initiatives will be the Local Authority), and must set out the reasons for the determination as to whether an EIA is required or not.

If acting both as Competent Authority for EIA Screening and as developer, to avoid any suggestion that there is a conflict of interest, ensure that there is a “functional separation” between the individuals involved in promoting an Active Travel Initiative and those responsible for making the EIA Screening Determination.

EIA Screening Consultation

Both the EIA Screening Report and EIA Screening Determination must be made available to the public after the determination has been made.

This must be completed before any decision is taken to implement any Active Travel Initiatives as this will determine the statutory approval route to be followed.

It is very important not to in any way pre-judge the statutory approval route prior to a screening determination having been made.

Determination of Planning Process

The outcome of the determination will be one of the following options:

1. The proposal can be progressed under the provisions of Section 38,
2. An EIAR is required and an application for development consent will be made to An Bord Pleanála,
3. No EIAR is necessary but Appropriate Assessment is required, which will be submitted to An Bord Pleanála, or
4. Development consent under Section 179 of the Planning and Development Act 2000 is required and the proposal will be the subject of a Part 8 Procedure.

Where the outcome of the determination process is that the proposal will be progressed under the provisions of Section 38, that decision should be recorded in a formal decision record and published on the local authority's website.

Consultation

Road authorities should carry out non-statutory public consultation in relation to proposals to be delivered under Section 38.

Road authorities are advised to place the public consultation material on its website for a period of not less than two weeks, allowing for submissions or observations to be submitted.

At the end of the consultation period, road authorities should carefully consider any submissions or observations received by the consultation deadline, and should determine whether:

- a. the proposal should proceed without any further modifications,
- b. the proposal should proceed with some modifications, or
- c. the proposal should not proceed.

Traffic Works Order

A decision to implement proposals to be delivered under Section 38 is an executive decision and should be recorded in a formal decision record as a Chief Executive's Order (**Traffic Works Order**) and should be published on the local authority's website. The local authority shall also inform the elected members of the Council of the determination.



Trial Procedure

The COVID emergency measures illustrated how quickly implemented schemes were found to be very effective, particularly where the designs were modified on site during the process to deal with issues. A trial procedure has now been developed but can only be used on proposals that fall within the requirements of Section 38. Screening process must have been carried out as outlined for the permanent procedure.



Trial Procedure

The core rationale for a trial is to allow particular proposals to be implemented on a temporary basis, for a defined period of time, allowing the impacts of the proposal to be monitored.

This then informs a subsequent decision on whether the proposals should, or should not, be implemented on a permanent basis. Accordingly, instead of seeking public feedback on draft proposals in the usual manner, the consultation process should be focused on obtaining feedback on the trial scheme in operation.



Trial Procedure

The period of the trial should be established.

The trial period should be between 6 months and 12 months, but where there are specific reasons to do so, shorter or longer trials can be considered.

However, the period of a trial should not exceed 18 months.

The local authority should consult with the An Garda Síochána and, in the case of schemes where the direction of general traffic movement on a road is proposed to be changed or restricted, the fire service and the ambulance service.



User Sentiment Survey (May 2022)

- 80 interviewees took part
- 85% had favourable attitude towards active travel schemes in general
- 74% believed scheme provides easier access for pedestrians and cyclists
- 70% noted a more pleasant experience of using Convent Road due to the scheme
- 30% of people were not at all in favour of the scheme



"It is an excellent scheme but it has not been fully implemented. We were promised cameras. There is no deterrent for anti-social behaviour currently"

"Love the flower beds if the thugs would leave them alone."

"Security cameras not fully installed and that's a problem."

"Hard for old people to access cemetery"

"I am a nervous cyclist but I can go by bike here with no trouble or worry."

"I used to take the long way to work but since the pedestrianisation I walk this way. I like it a lot"

Trial Procedure - Consultation

Inform the elected members of the Council of the intention to proceed with a trial.

Place a notice on its website setting out its intention to introduce the trial and providing details of the trial scheme, including:

- the general layout of the scheme,
- its approximate implementation commencement date, and
- the planned conclusion date of the trial scheme.

Outlining that Feedback on the trial scheme can be provided at any stage while the trial scheme is in operation.

The Local Authority must have a process in place for handling the feedback, particularly where modifications are required.

Trial Procedure – Temporary Traffic Works Order

A decision to implement a 'trial' is an executive decision and should be recorded in a formal decision record as a Chief Executive's Order (**Temporary Traffic Works Order**) and should be published on the local authority's website.

Ideally construction materials used in a trial should be a temporary element, such as removable kerbs and bollards, which can be modified and removed with ease at the end of the trial.

The trial period can be changed by giving notice, up to a maximum of 18 months.

Trial Procedure – Outcome

Within the final three-month period prior to the planned conclusion date of the trial scheme, the Local Authority shall compile a report of the trial scheme.

This report should set out its assessment of the operation of the trial scheme, a summary of the feedback received during the trial period and a recommendation that:

- a. the provisions of the trial scheme should be implemented on permanent basis,
- b. a modified version of the trial scheme should be implemented on a permanent basis,
- c. the provisions of the trial scheme should not be implemented on permanent basis,
- d. an alternative trial scheme should be considered for implementation.

Trial Procedure – Outcome

As with normal Section 38 procedures an executive decision should be made and recorded in a formal decision record as a Chief Executive's Order (**Traffic Works Order**).

The determination should also be published on the local authority's website and the elected members should be notified of the decision.

At end of the period of the trial scheme, infrastructure elements of the trial should be removed as soon as practicable, unless a prior decision has been taken to make the provisions of the trial scheme permanent either with or without modifications.

UN Convention of the Rights of People with Disabilities.

The UNCRPD gives an obligation for public bodies to consult with person with disabilities, to ensure that the lived experience of disability is used to inform decision making.

Decision-making processes may include developing policy advice, strategies, standards and codes of practice, designing processes, services, public infrastructure and public spaces, and carrying out research projects.

The NDA have published a Guideline to help outline how DPO are consulted.



UN Convention of the Rights of People with Disabilities.

Consult

It is recommended that every public Body going out to Public Consultation send out the details of the consultation to:
The DPO's.

As I Am - info@asiam.ie

Disabled Women Ireland - disabledwomenireland@gmail.com

Irish Deaf Society - info@irishdeafsociety.ie

Independent Living Movement of Ireland - info@ilmi.ie

National Platform of Self Advocates - myvoiceireland@gmail.com

Physical Impairment Ireland - physicalimpairmentireland@gmail.com

Voice of Vision Impairment - info@VVI.ie

Invisible Disability Ireland - invisibledisabilityireland@gmail.com

Relevant local county Disability Groups (for example via PPN's)

The Disability Stakeholder Group (DSG) members.

UN Convention of the Rights of People with Disabilities.

Accessible Format

It is recommended that every Public Body that is going out to Public Consultation ensure that they provide information in a format that is accessible to all:

- Must provide a version that is accessible for people with vision impairments who use screen readers

- Provide an Easy to Read Version on strategy or reports for people with intellectual Disabilities.

The consultation method must allow to separate the submissions from Disability User Groups and the elderly so that they can be addressed in the consultation report produced from other submissions.

Consideration should be given to hosting a webinar for Groups, if requested, on a specific public consultation, to explain aspects of it and receive queries.

UN Convention of the Rights of People with Disabilities.

Provide Feedback

Following engagement, those responsible for carrying out consultation should provide feedback to all participants on how views were considered and taken on board and for significant policy issues explaining why they were not taken on board.

For example, a public body or Department may develop a consultation report that summarises the number of submissions received, key points raised in the submissions, whether these were taken on board or not, and future plans (if any) for further engagement.

Key Takeaways:

Create Processes.

Determine the correct Planning Process.

Consult.

Record and Publish decisions.



An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

Thank You

Questions to be entered through SLIDO when entering your question please direct it to **Joe Seymour/John McCarthy** and they will be addressed at the end of the session:

Slido.com and enter 5812867
Or via the QR Code





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

LOCAL AUTHORITY ROADS CONFERENCE and EXHIBITION – 2024

Day 2-Session 1-Presentation 2

Cycle Design Manual

Joe Seymour

Head of Active Travel Investment

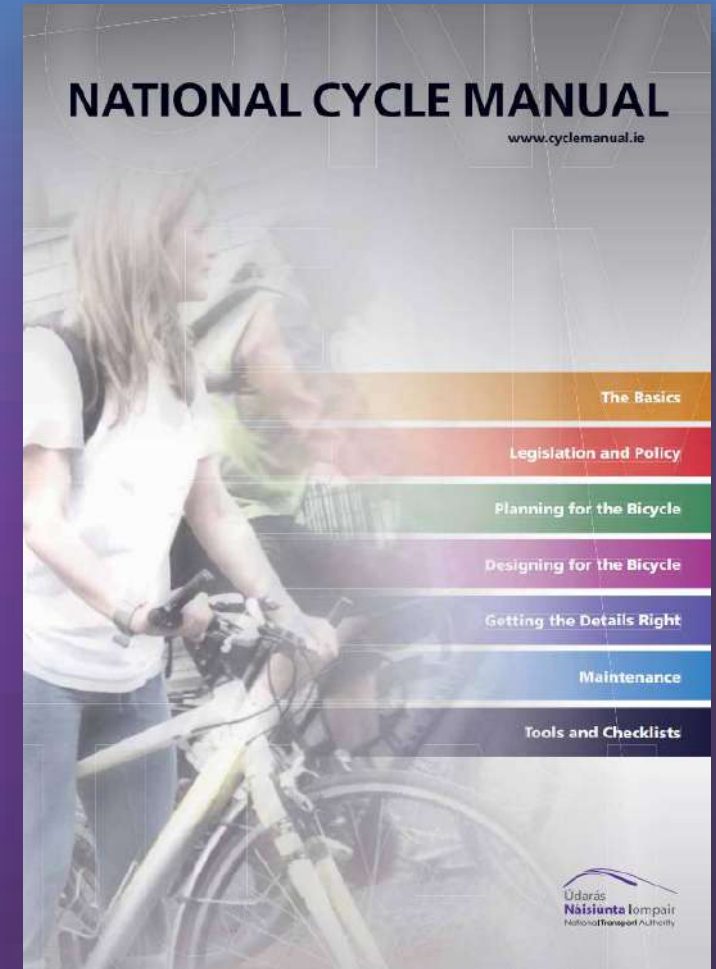
National Transport Authority



The face of cycling in Ireland is changing!

Previous Design Manual

- 🚲 Current design manual in place since 2011.
- 🚲 High quality document which was of its time.
- 🚲 The type of infrastructure that is seen as necessary to attract new cycle users in line with CAP Targets were available in 2011 manual, but needed more highlighting and details.

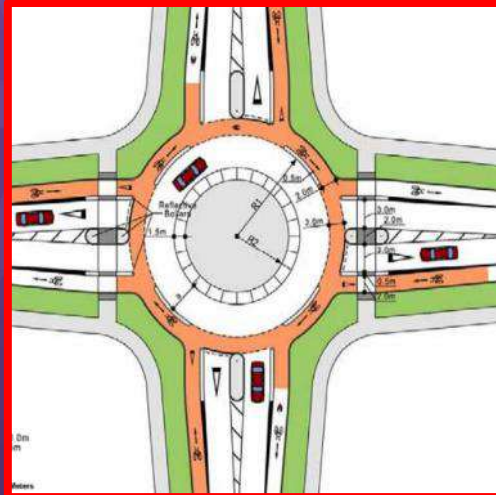


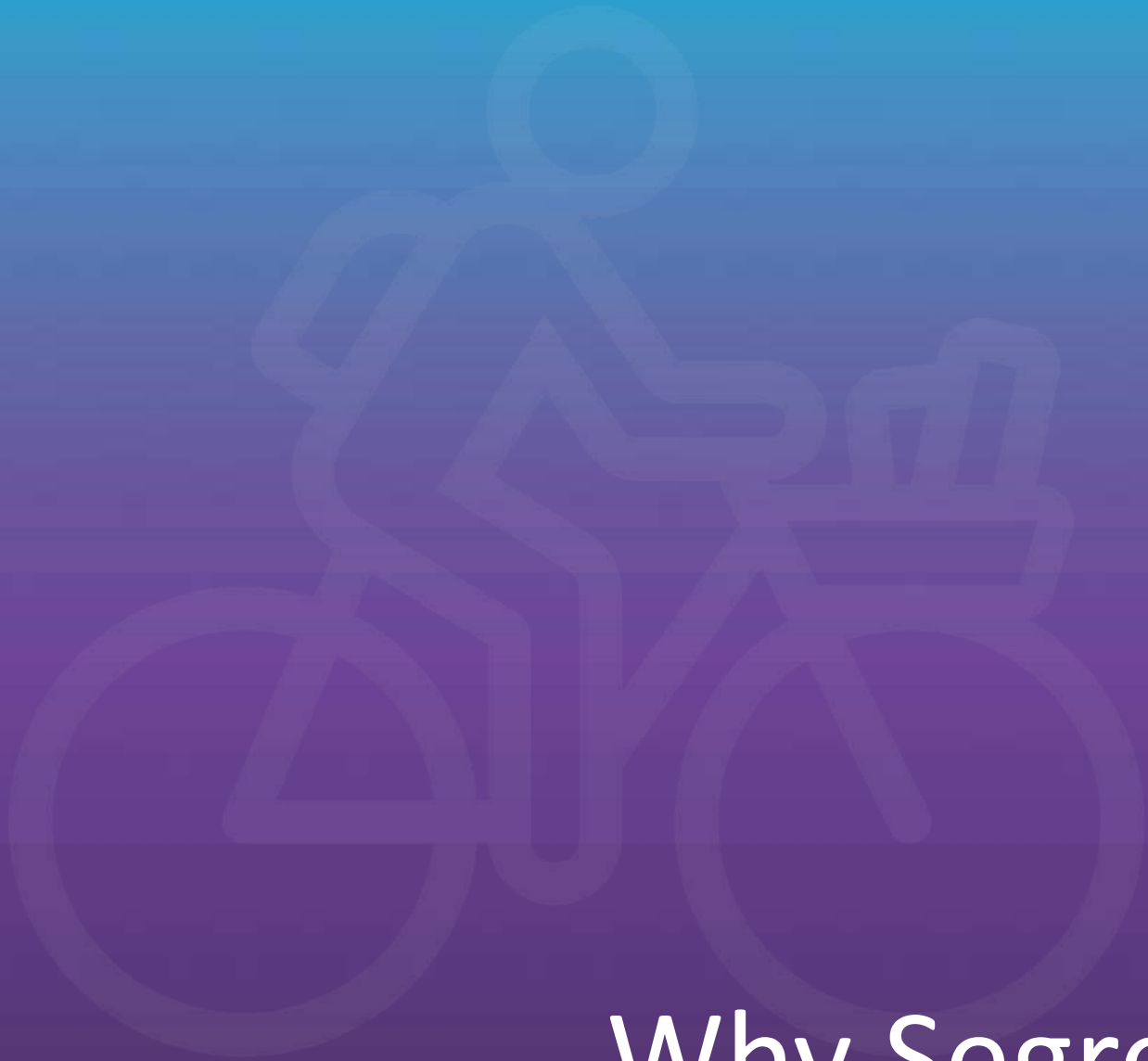
Previous Design Manual

Change from sharing with traffic



Segregated from traffic





Why Segregate?

ROAD TRAFFIC FATALITIES URBAN AREAS IN THE EU (2022)

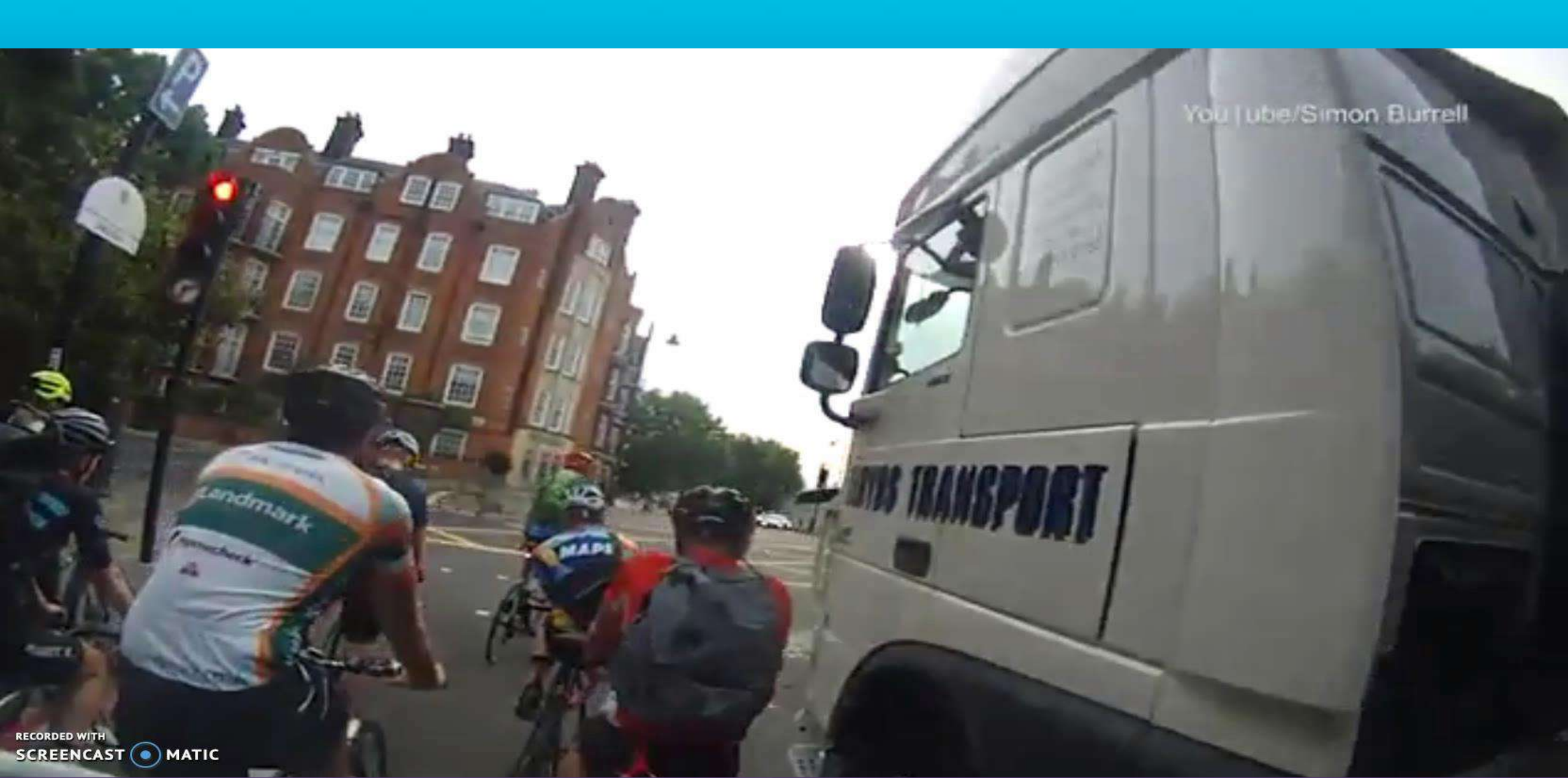
by road user and (other) 'main vehicle'
involved in the crash

IN A COLLISION WITH...

FATALITIES			PEDESTRIAN	BICYCLE	MOPED	MOTORBIKE	CAR	LORRY (<3.5T)	HEAVY GOODS VEHICLE (>3.5T)	BUS OR COACH	OTHER VEHICLE/ UNKNOWN	NO OTHER VEHICLE INVOLVED	TOTAL
PEDESTRIANS		▶	●	21	17	96	1674	282	260	84	161	●	2595
CYCLISTS		▶	6	35	9	13	491	84	130	25	36	316	1145
MOPED RIDERS		▶	2	4	2	3	114	27	13	4	10	110	289
MOTORCYCLISTS		▶	12	4	1	24	603	91	45	10	21	490	1301
CAR OCCUPANTS		▶	6	6	1	8	551	119	126	41	87	1147	2092
LORRY (<3.5T) OCCUPANTS		▶	0	0	0	0	21	12	15	1	2	64	115
HEAVY GOODS VEHICLE (>3.5T) OCCUPANTS		▶	0	0	0	0	3	2	3	1	3	25	37
BUS OR COACH OCCUPANTS		▶	0	1	0	0	10	3	2	0	2	11	29
OTHER/UNKNOWN		▶	0	0	0	1	71	14	18	11	8	154	277
TOTAL			26	71	30	145	3538	634	612	177	330	2317	7880



Source: BicycleDutch



You Tube/Simon Burrell

RECORDED WITH
SCREENCAST  MATIC











Source: You Tube/ Simon Burrell

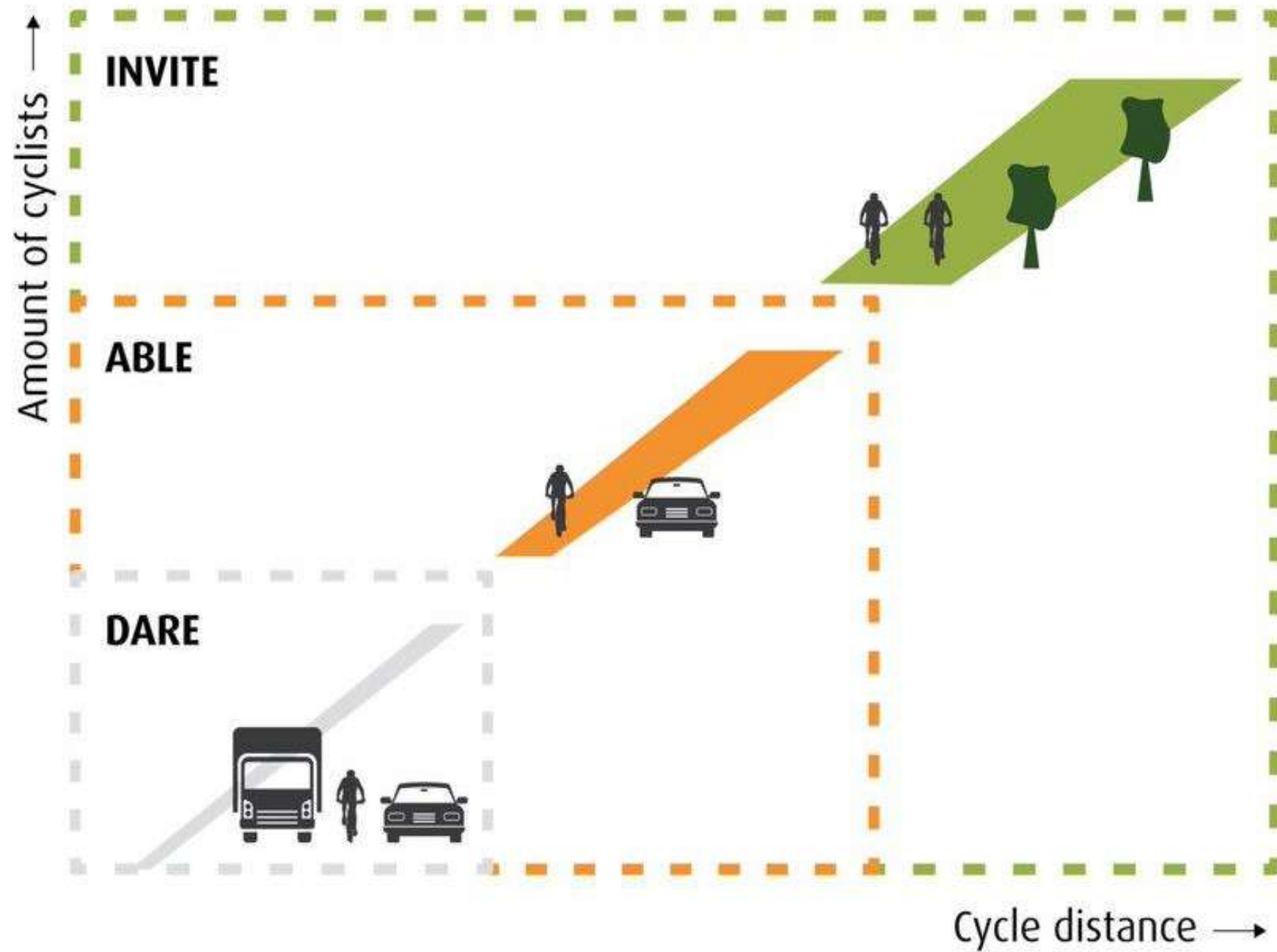


Source: An Garda Síochána

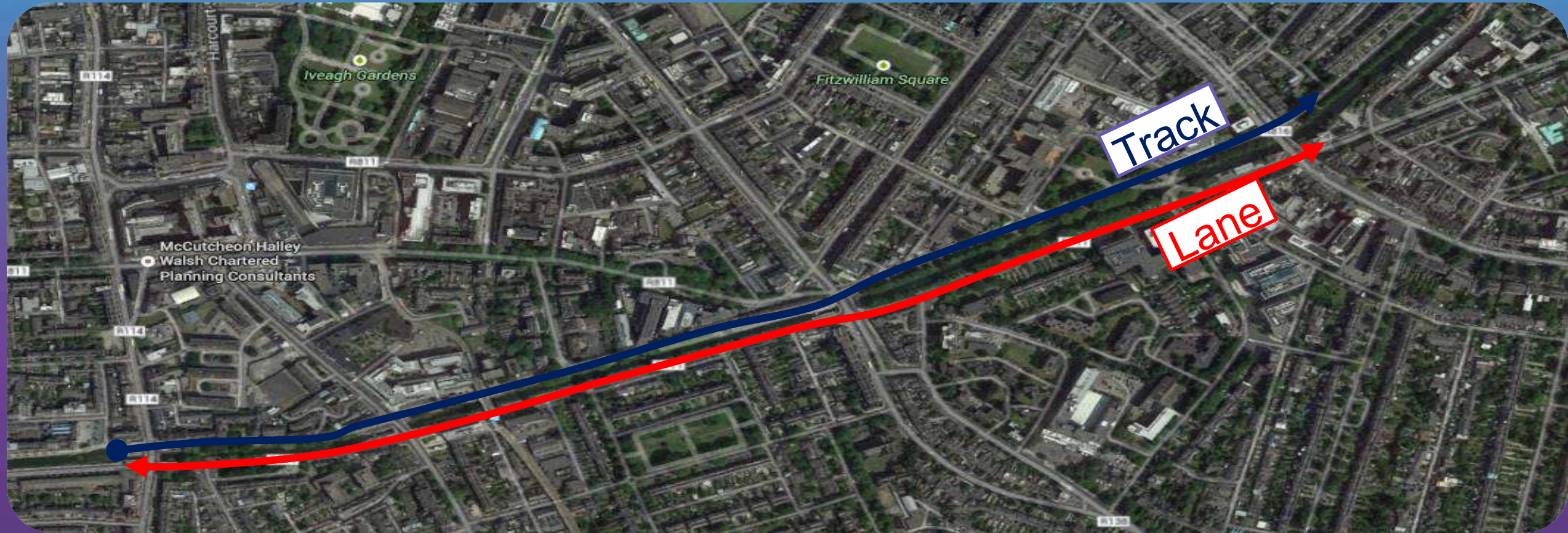
Who we are designing for:



-  equal or dominating infrastructure
-  8 - 80 years
-  up to 15 kilometers
-  40% cycle potential
-  present but dominated infrastructure
-  18 - 48 years
-  up to 5 kilometers
-  20% cycle potential
-  Hardly any infrastructure
-  18 - 28 years
-  up to 3 kilometers
-  4% cycle potential



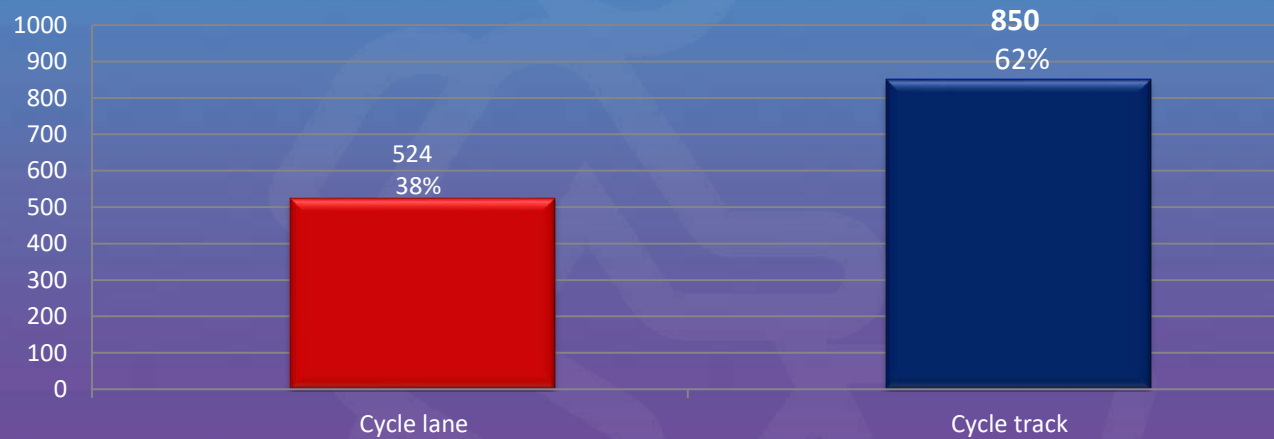
Segregation or Not?



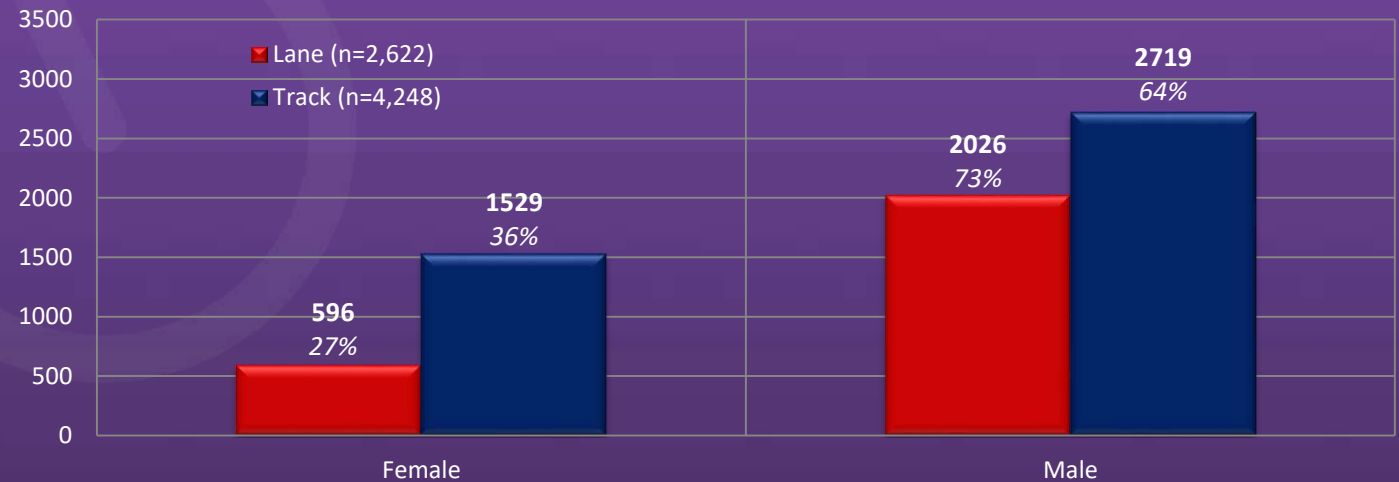
Source: Google Maps

Who is using the facilities?

Volume split of cycle routes between 8-10am

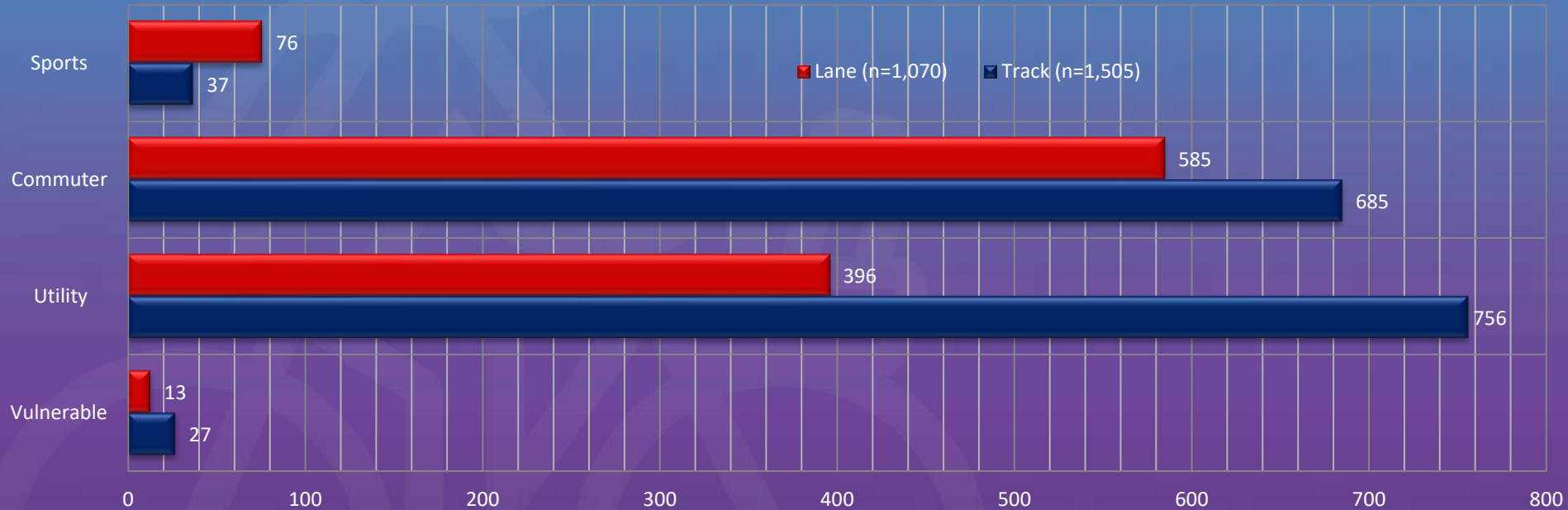


Gender split of each route



Who is using the facilities?

User-type profile for each route



Continuous Networks

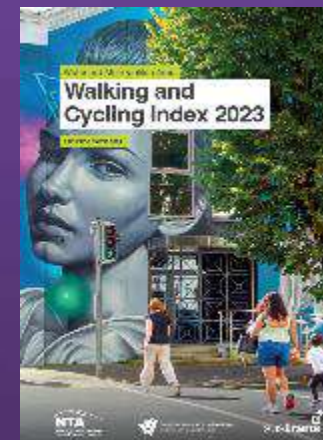
- 🚲 The creation of continuous networks in our urban areas is our primary aim.
- 🚲 It will not be possible to get the desirable minimum requirements everywhere, but it is important that the best possible infrastructure is provided in these weak links.
- 🚲 Relaxations and Departure are being introduced to facilitate this process.



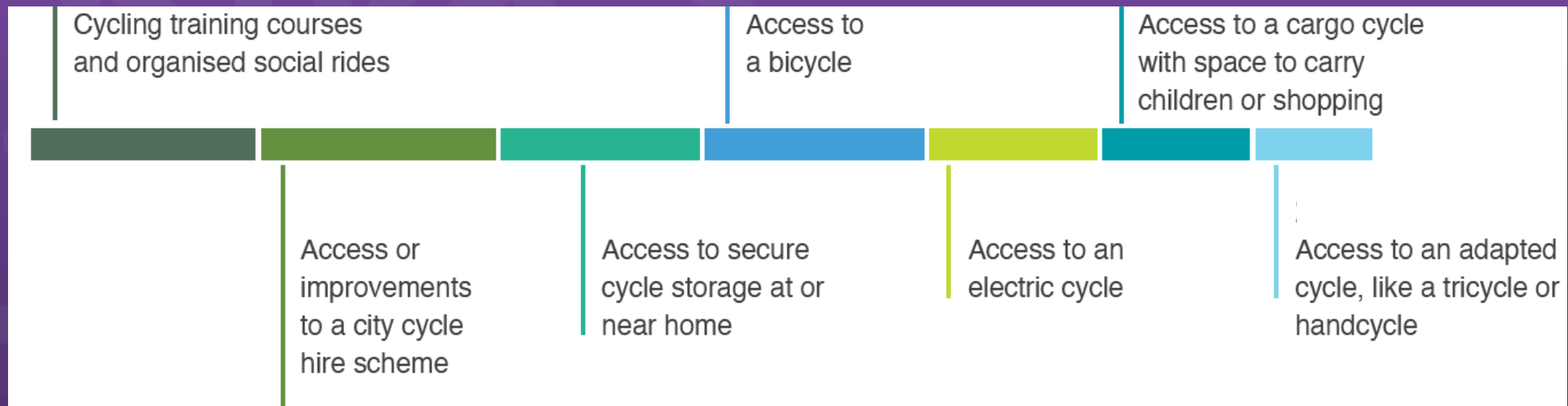
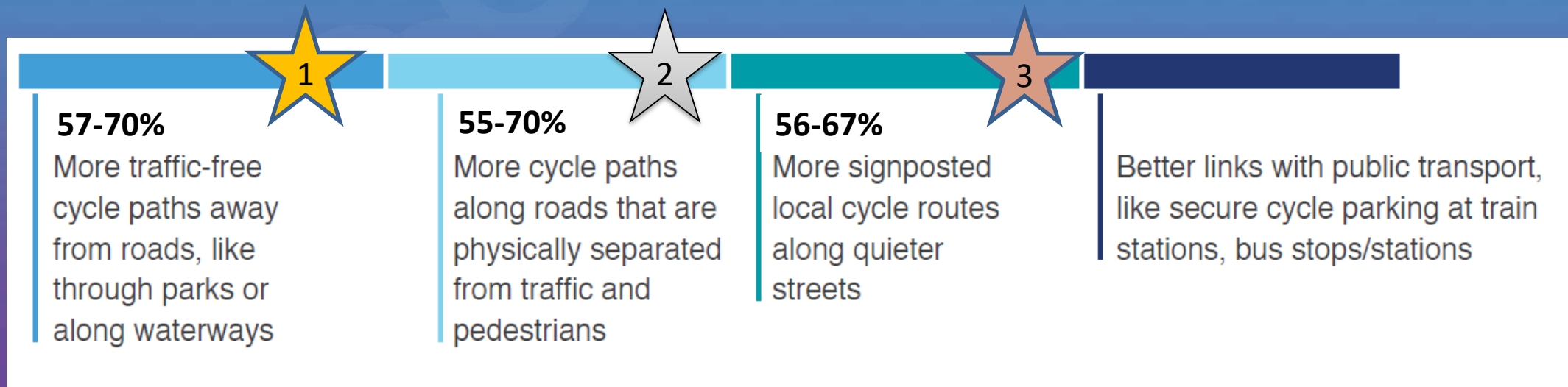
Walking and Cycling Index 2023

69-88%

of residents support building more cycle paths physically separated from traffic and pedestrians, even when this would mean less room for other road traffic



- What would help people cycle more?





Cycle Design Manual

New Design Manual

- 🚲 Developed over 2 years, taking into account developing knowledge in Ireland and Internationally.
- 🚲 More focus on designing for a wider variety of users and cycles.
- 🚲 More focus on segregation of cyclists from vehicles and pedestrians.



Safe Systems Approach

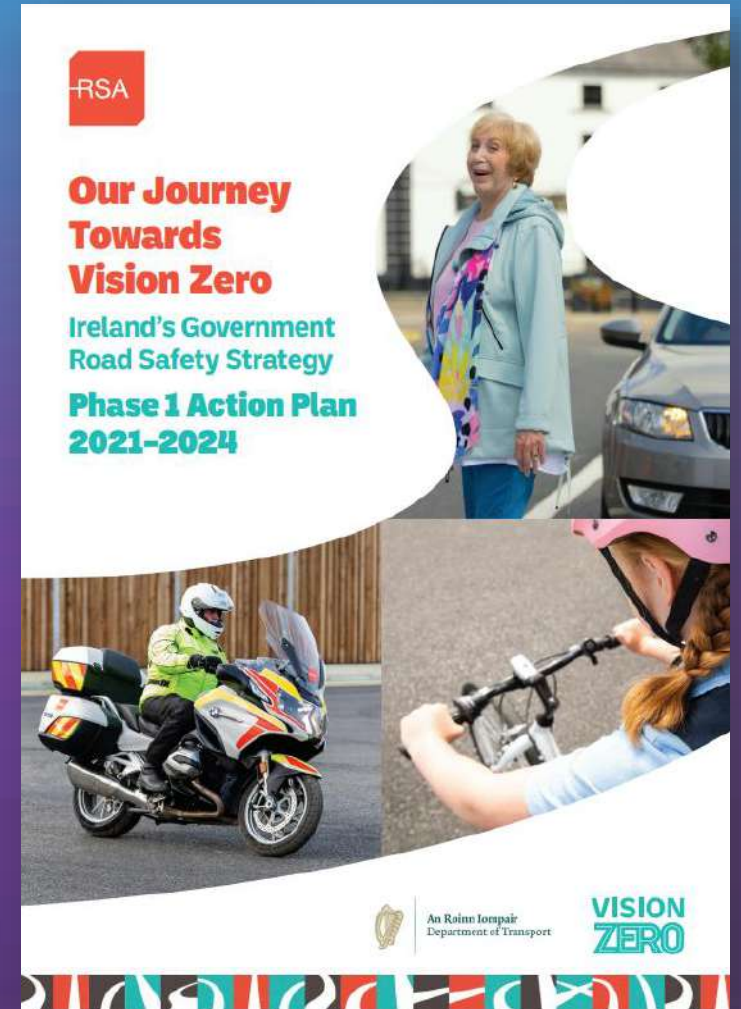
🚲 Humans are fragile and make mistakes - key is to ensure designs are forgiving to prevent fatal or serious injuries

Safer Roads and Road Sides

Safer Speeds

Safe and Healthy Modes of Travel

Reduce the number and severity of injuries



New Design Manual

Cycle Design Manual Version 1.0

2.1 Five Main Requirements for Cycle-friendly Infrastructure

For cycle infrastructure to cater for the needs of people who currently cycle and to also attract new cycle users to the network, there are five main requirements which designs should fulfil under the headings of:

- Safety
- Coherence
- Directness
- Comfort
- Attractiveness

i. Safety

There are two aspects to this requirement, actual safety and perceived safety.

Actual Safety

Cycle facilities should be designed so that they are safe for people of all ages and abilities to use. To ensure facilities are safe, there are a number of factors that need to be considered.

An appropriate type of facility should be chosen in accordance with Table 2.1. For on-line cycle facilities (i.e. facilities within road boundaries), the type of provision will primarily depend upon vehicular traffic speeds and volumes. On roads and streets with very low traffic speeds and volumes, it will generally be safe to cycle on the carriageway therefore no specific cycle infrastructure may be required, although traffic calming may be necessary to ensure low vehicular speeds. Such streets might include residential or access streets. As traffic speeds and volumes increase, cycle facilities will generally need to be segregated from vehicular traffic to provide safe facilities for all users.

Getting the design and construction details right is also important to ensure facilities are safe to use. Some key considerations in this regard include the removal of potential hazards, providing high-quality smooth surfacing, ensuring smooth horizontal and vertical transitions and providing appropriate gradients.

From a safe approach perspective (See Section 2.2), designs should also be forgiving so that if/when mistakes or accidents occur, outcomes are as benign as possible. For example, the use of bevelled kerbs adjacent to cycle tracks can assist with evasive manoeuvres and the use of horizontal buffers can provide additional recovery space between cycle facilities and carriageways should accidents occur.

Perceived Safety

As well as being actually safe to use, facilities should be perceived to be safe i.e. people must feel safe using them. Perceptions of personal safety can vary from one individual to another, so facilities should generally be designed so that less confident users would feel safe using them. To assess the perception of safety, it could be useful for designers to consider the following:

- Is there sufficient passive surveillance?
- Is there sufficient lighting?
- Can cyclists travel freely without unnecessary interruptions/ stoppages?
- Are there enough access/egress points?
- Are there any known issues of anti-social behaviour/crime in the area that should be considered?

ii. Coherence

All a network level, cycle routes should be connected and easy to navigate. Cycle routes should not have gaps or be interrupted at difficult locations. Any weak links in the network will reduce the overall level of service, could deter new or less confident users to cycle and render a whole journey inaccessible for some people.

Clear signing and wayfinding can be particularly important where cycle routes use minor roads and off-line facilities that are not signed for other traffic. See examples in Figure 2.1. Wayfinding can be very useful for new users and visitors to navigate their way around the cycle network. Refer to Section 5 for further guidance on signing and wayfinding.

Coherence is also important at an individual scheme level, particularly where a number of different link types are connected. For example where the cycle provision changes from quiet street to a cycle track (Figure 2.2) the transition must be logical and intuitive.

Cycle Design Manual Version 1.0

Figure 2.1 Example of wayfinding on the Bux Langshare Rathdown County Council Active School Travel Scheme.

Figure 2.2 Example of a seamless transition from a quiet street to a cycle track, Eden Park, Dublin.

Similarly, at large or complex junctions the route for cyclists through the junction should be clearly defined and easily understood by all users. The use of red surfacing and road markings (see Figure 2.3) will be key design tools in this regard.

Cycle Design Manual Version 1.0

Figure 4.83 Typical layout of a protected junction with zebra crossings of the cycle track.

Figure 4.84 Example of mini zebra crossing of cycle track and pedestrian landing area (Image: Google Street View).

In addition to the common features of protected junctions discussed in section 4.4.2.1, a protected junction with zebra crossings of the cycle track includes the following features:

Cycle Design Manual Version 1.0

4.4.3.3 Protected Junction (TL501)

In a protected junction layout (see Figure 4.83), the cycle track is set back on the approach to the junction which creates space to manage the interaction between pedestrians and cyclists outside of the signal control.

Left turning cyclists are not governed by signal controls so can proceed to make the left turn whilst yielding to any pedestrians at the zebra crossings. Right turning cyclists make a two stage movement and cross the two arms of the junction under signal control.

Both pedestrians and cyclists then cross the junction under signal control, either in separate stages or in one combined 'wrap around' stage, depending on the volume of turning traffic (refer to section 4.4.4 for guidance on signal staging).

Figure 4.83 shows a typical layout of a protected junction with zebra crossings of the cycle track. Pedestrians cross the cycle track with priority on a mini zebra crossing and proceed to a landing area adjacent to the carriageway (see Figure 4.84). The landing area should be a minimum of 2.7m between kerbs to allow for tactile paving at each crossing point, and an appropriate space between the facilities. Cyclists yield to pedestrians at the zebra crossing and proceed up to a forward stop line adjacent to the carriageway if they are continuing straight-ahead or turning right.

Cycle Design Manual Version 1.0

TL701 Protected Roundabout with Cycle Priority

NOTES:

1. Suitable for junctions in urban areas only.
2. Suitable for traffic capacities up to 25,000 vehicles per day.
3. Crossing area under traffic signals through the junction is optional.
4. ICD capacity 25-40/s.
5. Single line application only.
6. Approach arms perpendicular to central island with no flaring. Consider overrun areas at all signal transitions for larger vehicles.
7. Remove unnecessary crossings, with overrun areas around central island for larger vehicles.
8. Pedestrian and cycle crossings of carriageway must be raised.
9. Cycle crossing must be set back on max. from 200-400.
10. Consider including 'orange' search in crossings where space permits.
11. Low level planting only in landscaped areas around the roundabout or consider hard landscaping.

KEY DIMENSIONS

- a) 5m
- b) 3.25m
- c) 5m Minimum
- d) 100mm wide, 100mm high (100mm typically up to 40m)
- e) 5m Minimum
- f) 2m Minimum
- g) 10-37m typically
- h) typically 72m but may be larger (check 10 to ensure narrow crossing carriageway is achieved; 50mm setback to kerb)

KEY FEATURES

- 1. Baffle Downcut
- 2. Red blister tactile

ROAD MARKINGS (Refer to TRM Chapter 7)

- 1. RRM 011
- 2. RRM 018 & 019
- 3. Baffle Foot Markings (100mm wide, 100mm high, 100mm max)
- 4. RRM 022
- 5. RRM 021
- 6. RRC 001

273

Cycle Design Manual Version 1.0

TL701 Protected Roundabout with Cycle Priority

Cyclist perspective view approaching roundabout

Key Features:

1. Protected cycle track.
2. Cycle track uses the same level as the at-grade crossing.
3. The pedestrian crossing area is flush, on a flat top flange, across the cycle track, with tactile paving as appropriate. Cyclists must yield to crossing pedestrians.
4. Pedestrian refuge area.
5. Cyclists entering the roundabout must yield to the circulating cyclists.
6. Raised pedestrian zebra crossing followed by parallel cycle zebra crossing with single narrow traffic lane entry/exit.
7. SUDS / public realm greening opportunities.




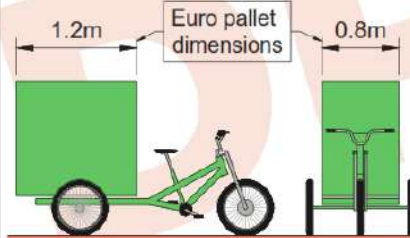


274

New Design Vehicles


🚲 Designing for a wider variety of cycles, including the wide range of accessible cycles and cargo bikes which are growing in availability and require wider infrastructure.

🚲 Universal design vehicle: 2.8m long x 1.2m wide.

🚲 8 to 80 design principals at its core.

Standard Bicycle	Wheelchair Bicycle	Child Trailer Bicycle
 <ul style="list-style-type: none">• 1.8m length• 0.65m width• 1.65m turning circle	 <ul style="list-style-type: none">• 2.65m length• 0.66m width• Additional turning circle requirements up to 3.2m	 <ul style="list-style-type: none">• Additional turning circle requirements up to 3.2m• Trailer attached (up to 1.3m long)
Cargo Bicycle	Front Loading Cargo Bicycle	Tricycle / Handcycle
 <ul style="list-style-type: none">• Trailer can be attached (extra 1.6m long)	 <ul style="list-style-type: none">• 2.0m - 2.5m• Up to 0.85m wide• Additional turning circle requirements up to 2.65m	 <ul style="list-style-type: none">• Additional turning circle requirements up to 2.65m• Lower eye height for visibility• Lower clearance to kerbs and other objects

New Design Manual

 Clearer instruction to designers on the type and widths of cycle facilities to be used.


 Departure from standards process initiated to raise quality of facilities.

Table 2.1 - Cycle facilities selection guide

Speed Limit	Two-way traffic flow (peak hour pcus)	Remote Cycleway/ Greenway	Standard cycle track (incl. two-way tracks)	Stepped cycle track	Protected Cycle Lane	Mandatory Cycle Lane	Mixed Traffic
20km/h	< 200	Green	Green	Green	Green	Green	Green
	200-400	Green	Green	Green	Green	Green	Green
	> 400	Green	Green	Green	Green	Orange	Orange
30km/h	< 200	Green	Green	Green	Green	Green	Green
	200-400	Green	Green	Green	Green	Green	Orange
	> 400	Green	Green	Green	Green	Orange	Orange
40km/h	< 200	Green	Green	Green	Green	Green	Green
	200-400	Green	Green	Green	Green	Orange	Orange
	> 400	Green	Green	Green	Green	Pink	Pink
50km/h	< 200	Green	Green	Green	Green	Orange	Orange
	200-400	Green	Green	Green	Green	Pink	Pink
	> 400	Green	Green	Green	Green	Pink	Pink
60km/h	Any	Green	Green	Orange	Pink	Black	Black
≥ 80 km/h	Any	Green	Pink	Pink	Black	Black	Black

■ Provision should be suitable for most users
■ Provision may not be suitable for all and may exclude some potential users
■ Provision not recommended as it's unlikely to be suitable for a range of users
■ Provision not suitable

Table 2.2 - Width Calculator

A. Inside Clearance			
Type	Additional width required (m)		
Flush or near-flush surface including low and splayed kerbs up to 60mm high	0.00		
Kerbs 61mm to 150mm high	0.20		
Vertical feature from 151mm to 600mm high	0.25		
Vertical feature above 600mm high	0.50		

B. Central Width			
Direction	Flow (cycles per peak hour)	Desirable minimum width (m)	Absolute minimum width (m)
One-way cycle track	<300	2.00	1.5*
	>300	2.50	2.00
Two-way cycle track	<300	3.00	2.00
	>300	4.00	3.00
Cycle lane	All	2.00	1.50
Shared Active Travel Facility	<300	4.00	3.00
	>300	5.00	4.00

*May not cater for comfortable overtaking or cycling two abreast.

C. Outside Clearance	
Type	Additional width required (m)
Flush or near-flush surface including low and splayed kerbs up to 60mm high	0.00
Kerbs 61mm to 150mm high	0.20
Vertical feature from 151mm to 600mm high	0.25
Vertical feature above 600mm high	0.50


Speed limit (kph)	One-way cycle Tracks		Two-way cycle track	
	Desirable min buffer (m)	Absolute min buffer (m)	Desirable min buffer (m)	Absolute min buffer (m)
≤30	0.00	0.00	0.50	0.30
40/50	0.50	0.00	0.50	0.30
60	1.00	0.50	1.00	0.50
80	2.00**	1.50**	2.00**	1.50**
100	3.50***	1.50***	3.50***	1.50***

- Notes:**
- i. Desirable minimum widths should be used when calculating required widths of facilities. Where desirable values cannot be achieved, incremental reductions towards absolute minimum values may be considered.
 - ii. The use of widths less than the above guidance should be avoided. In exceptional circumstances where widths cannot comply with the guidance, the designer should seek a departure from standard and this should be approved by the relevant Sanctioning Authority prior to incorporation into the design.
 - iii. On gradients greater than 3%, cycle track width should be increased by 0.25 m to allow for greater lateral movement.
 - iv. Where gullies are present on a cycle track that do not allow cycles to easily overrun, the cycle track width should be increased by the widths of the gully.

Including any hard strip * Excluding any hard shoulder

New Design Manual

 Wider infrastructure to allow more social cycling and also overtaking of slower cyclists.

 More emphasise on reducing volume and speed of vehicles to allow cyclists to share the carriageway.



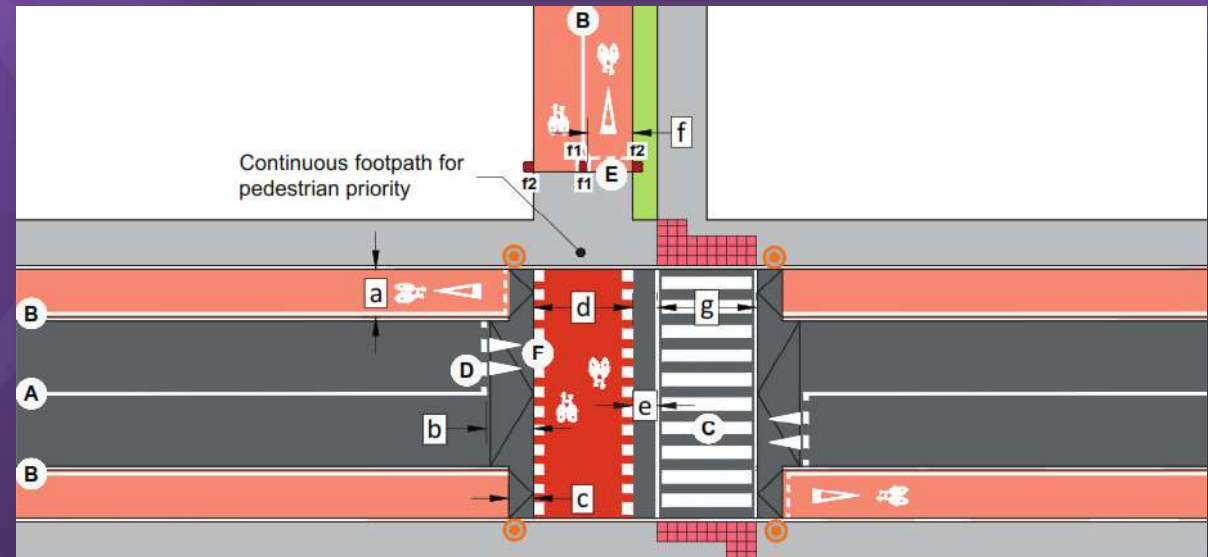
Contra Flow Cycle Lanes

- 🚲 More information on providing for contra flow cycling with use of shared street now proposed.
- 🚲 Minimum carriageway widths are recommended for two-way cycling on one-way shared streets.



Zebra Crossings

- 🚲 Introduction of mini-zebra crossings across cycle lanes to give priority to pedestrians.
- 🚲 Introducing parallel Zebra Crossings.
- 🚲 Marketing programme needs to be developed with RSA to improve road user behaviours.



Priority Junctions

- 🚲 The most common type of junction.
- 🚲 More emphasise placed on continuation of cycle and pedestrian facilities across side roads.
- 🚲 Will need drivers to yield right of way; while this is in line with existing Rules of Road will require a change behaviours.





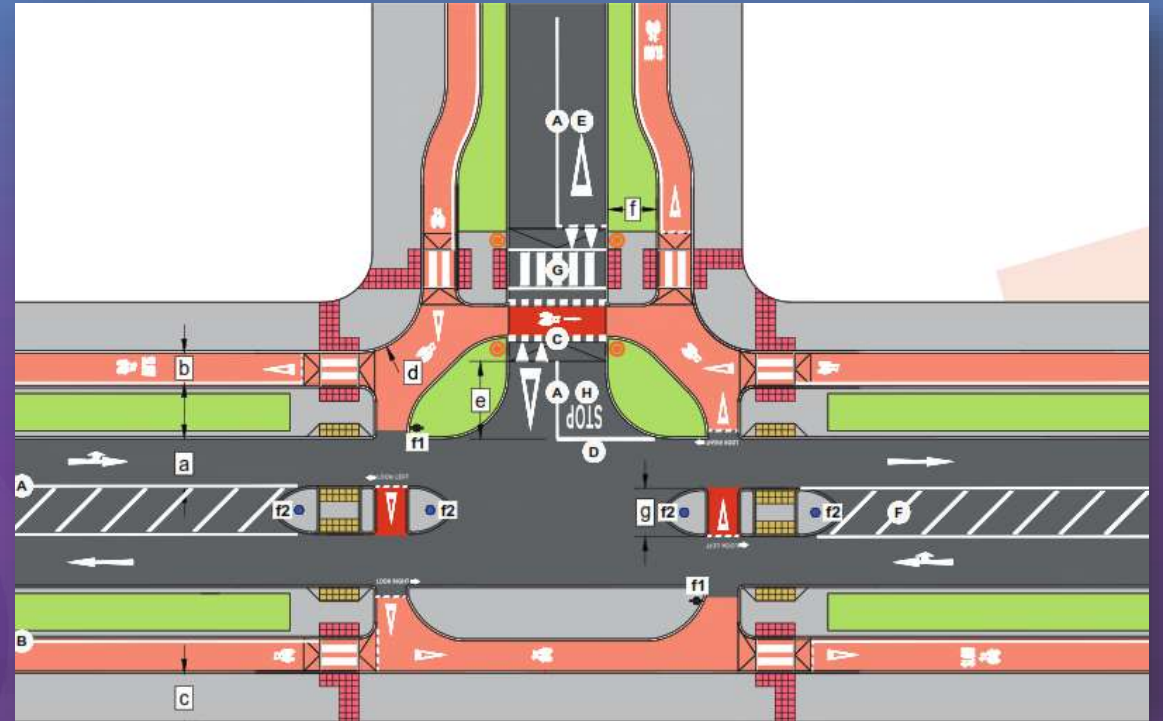
STOP

TAXI

Béalthar Eabhlóin
ST. HELENS ROAD

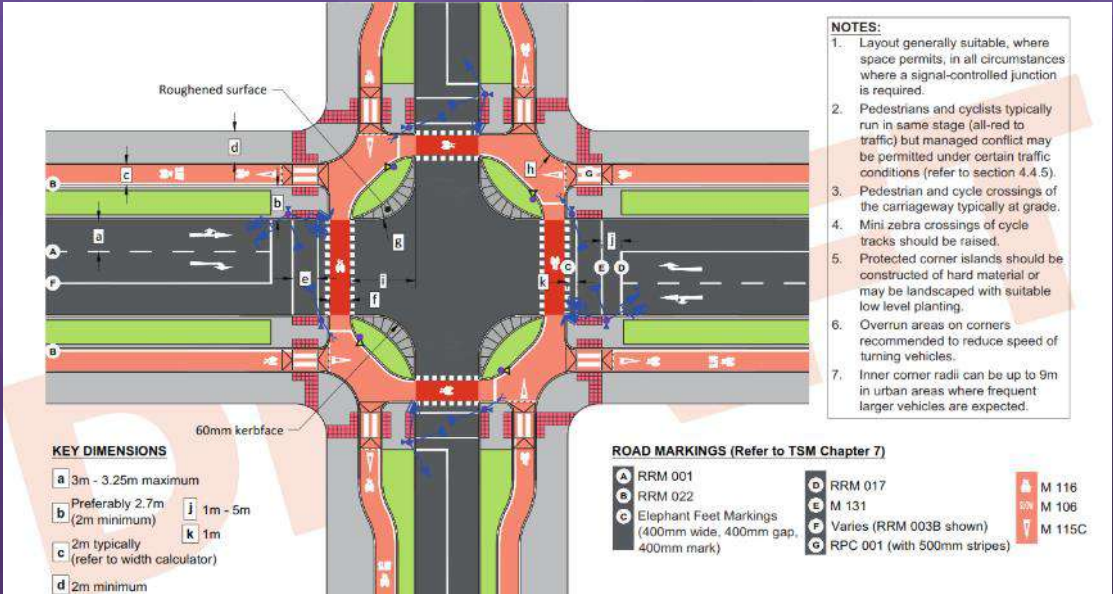
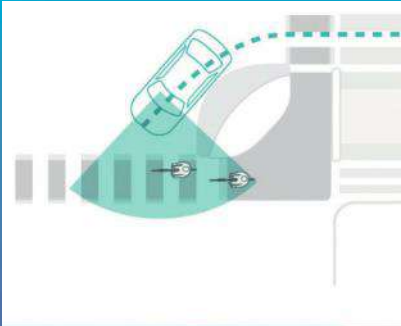
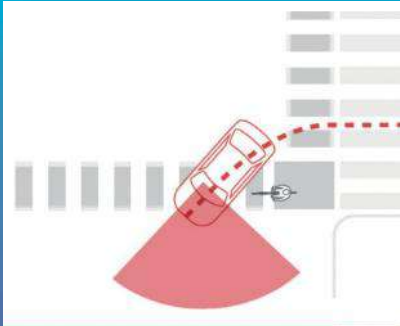
Priority Junctions

- 🚲 Introduces the concept of protected priority junctions.
- 🚲 Recommending using central refuge to allow pedestrians and cyclists to cross one lane at a time which is significantly safer.

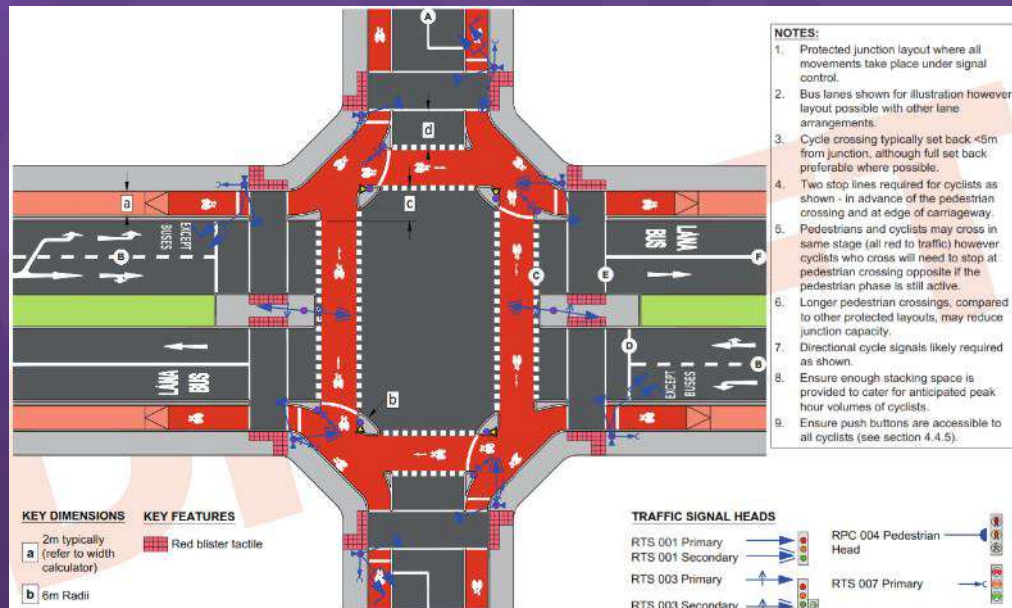
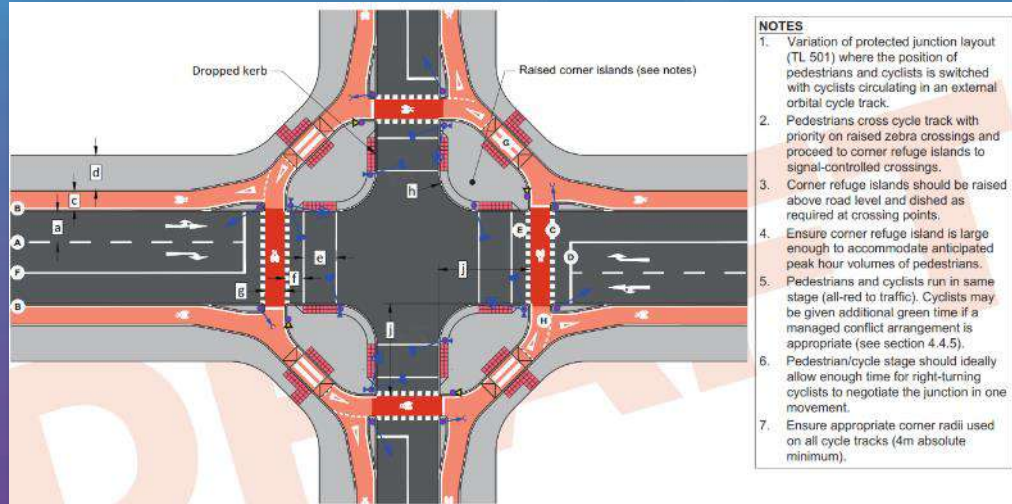


Signal Controlled Junctions


🚲 Introduces the concept of protected signalised junctions.



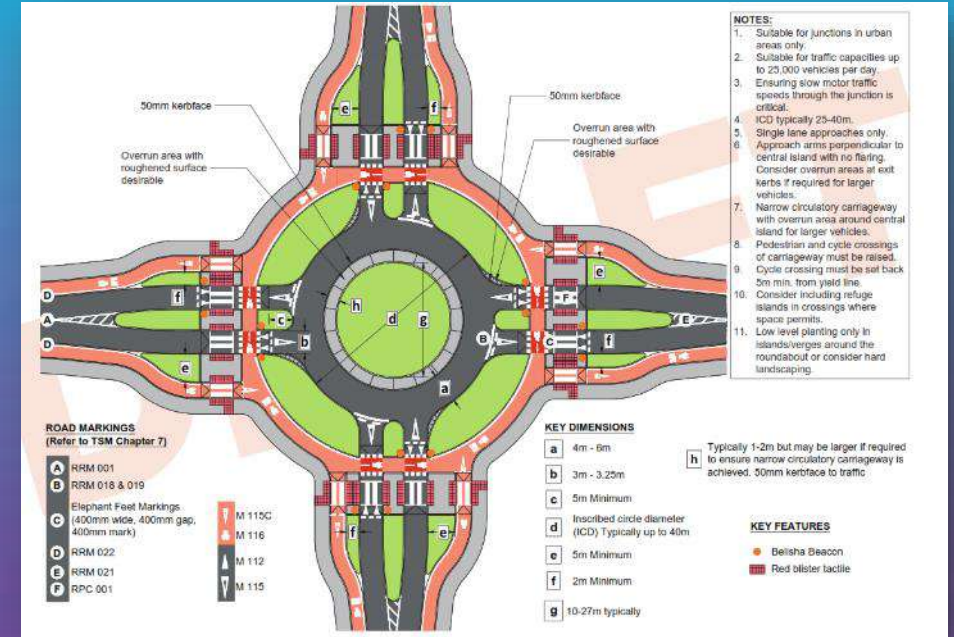
Signal Controlled Junction



Roundabouts

 Introduces the concept of protected roundabouts with cycle priority.

 Common in the Netherlands and being introduced in the UK and other countries.



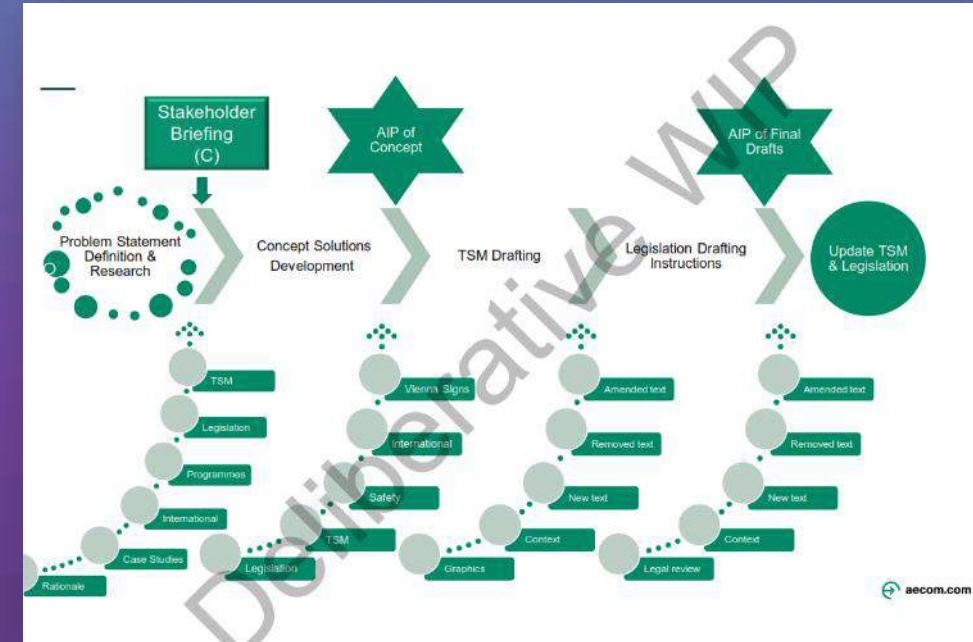


Legislative Change

🚲 A significant number of the new elements of the Cycle Design Manual are not catered for in current legislation, mainly signs and road markings that need to be introduced.

🚲 A process of reviewing the background legislation and development of amendments is underway so that all new aspects of the CDM will have legislative backing.

🚲 This is expected to be complete by the end of 2024.



Other Documents


NTA
Údarás Náisiúnta Iompair
National Transport Authority

**GUIDANCE FOR EIA AND
AA SCREENING OF ACTIVE
TRAVEL PROJECTS**





October 2023

NTA
Údarás Náisiúnta Iompair
National Transport Authority




**Access Control of
Active Travel
Facilities**

July 2022

In association with:
 **An Róimí Iompair**
Department of Transport 

NTA
Údarás Náisiúnta Iompair
National Transport Authority



**Rapid Build Active
Travel Facilities**


February 2023

NTA
Údarás Náisiúnta Iompair
National Transport Authority

**ACTIVE TRAVEL INFRASTRUCTURE
SCHEDULE OF RATES**

June 2023


NTA
Údarás Náisiúnta Iompair
National Transport Authority



**Specification of Red Surface
Course for Use on Off-Road
Urban Cycleways
- Interim Technical Advice**

April 2023


NTA
Údarás Náisiúnta Iompair
National Transport Authority



**Rapid Build SRTS
Front of School
Improvements
Advice Note**

July 2023


NTA
Údarás Náisiúnta Iompair
National Transport Authority



**Roundabout Retrofit
Including Rapid Build Options**


July 2023

NTA
Údarás Náisiúnta Iompair
National Transport Authority



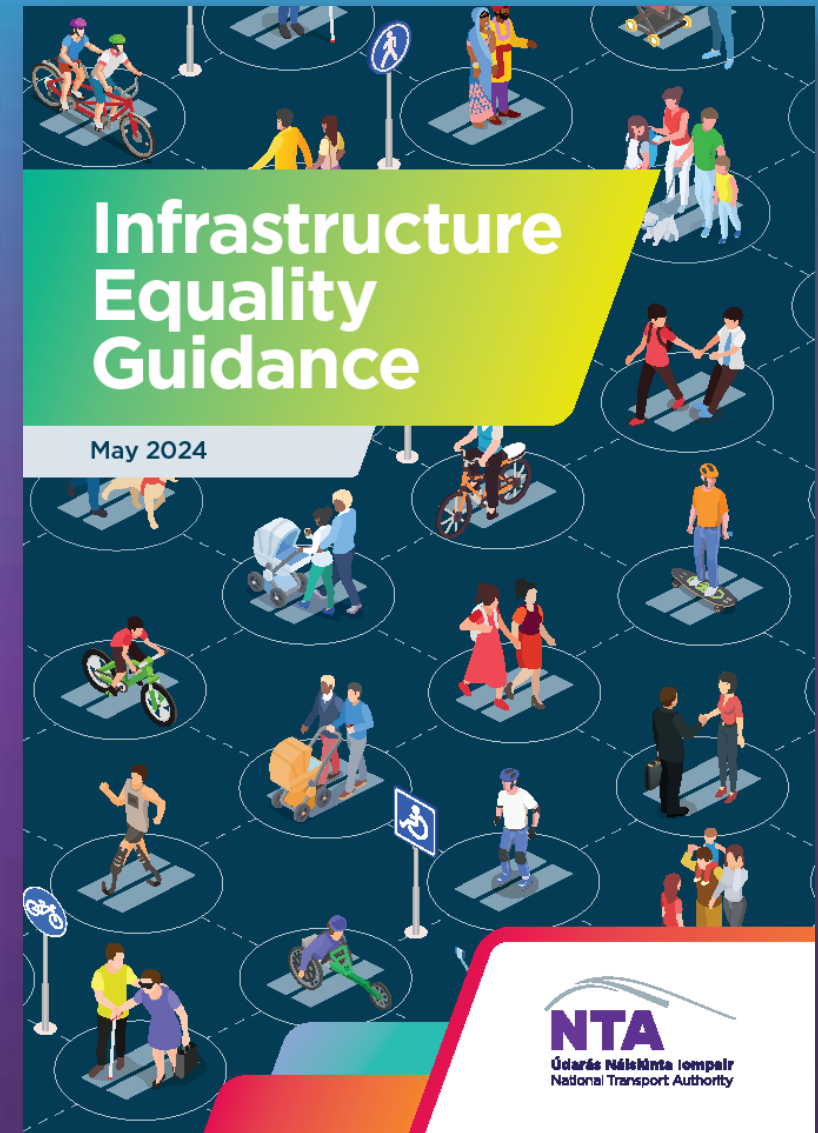
**Greening and Nature-based SuDS for
Active Travel Schemes**

September 2023



Equality Guidance

- To be Published in May.
- Sets out guidelines to follow in order to achieve equitable infrastructure development. These guidelines are intended for use on all active travel schemes funded by the NTA which result in new construction or permanent changes to a street layout.
- This guidance presents a number of issues to be aware of when designing or upgrading an active travel scheme.
- These guidelines are not intended as a check of compliance with design standards, nor are they concerned with structural safety.





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

Thank You

Questions to be entered through SLIDO when entering your question please direct it to **Joe Seymour** and they will be addressed at the end of the session:

Slido.com and enter 5812867
Or via the QR Code





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

ROADS Services Training Group

LOCAL AUTHORITY ROADS CONFERENCE and EXHIBITION - 2024

Day 1 Session 1 Presentation 3

The Development of Ireland's National Cycle Network

Richard Bowen
Capital Programme Portfolio Manager
Transport Infrastructure Ireland
(richard.bowen@tii.ie)

Sligo Radisson Hotel, Sligo, May 2024



An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

LOCAL AUTHORITY ROADS CONFERENCE and EXHIBITION – 2024

The Development of Ireland's National Cycle Network

Richard Bowen
Capital Programme Portfolio Manager
Transport Infrastructure Ireland

(richard.bowen@tii.ie)



Presentation Format

1. Introduction to the NCN Plan
2. NCN Plan Implementation Strategy
3. Roadspace Reallocation Pilots
4. Quiet Roads Pilots



An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association



Introduction to the NCN Plan



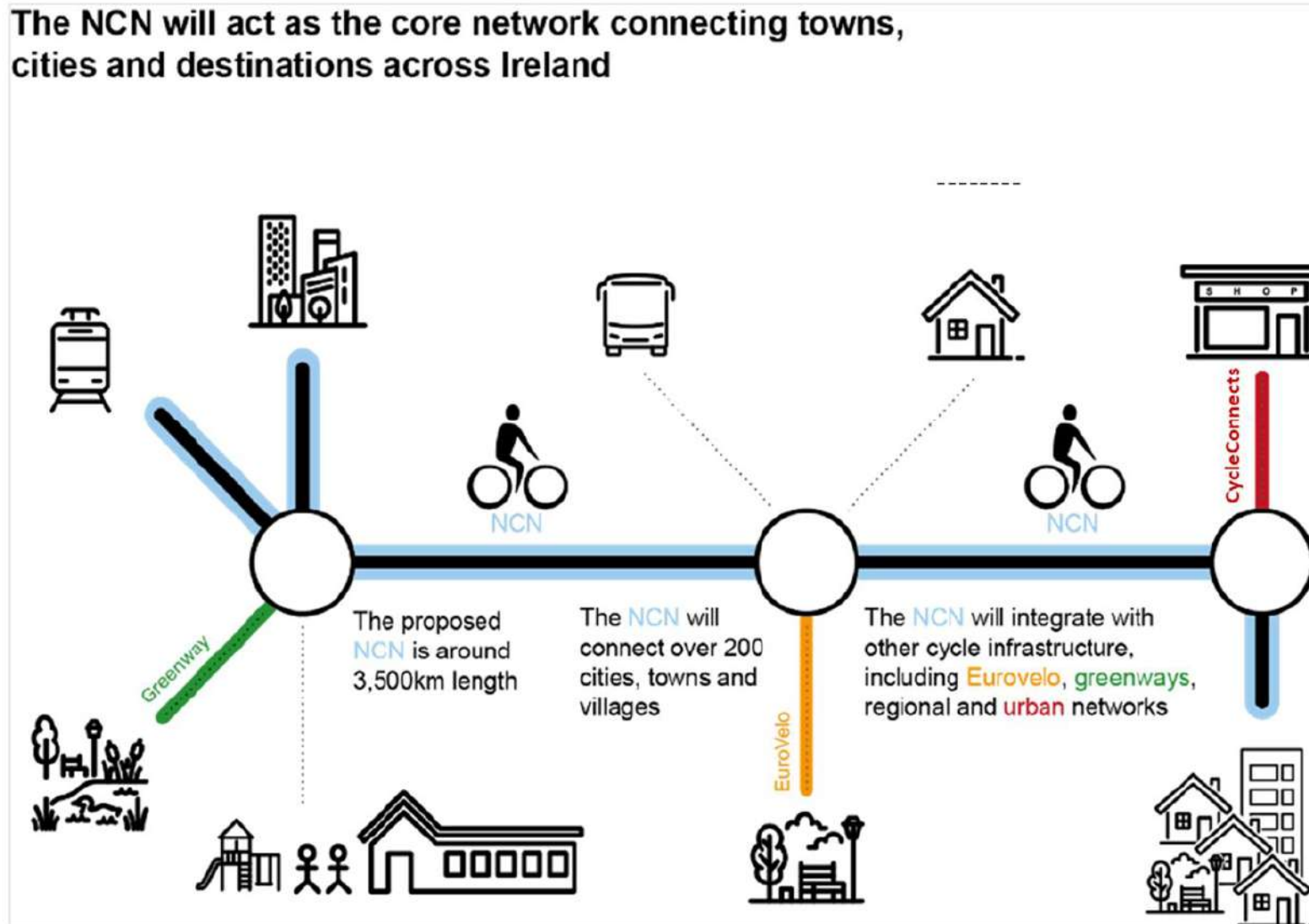
The NCN is mandated in the NDP 2021-2030

“The development of a new **National Cycling Network Strategy**...will **map existing cycling infrastructure** in both urban and rural areas, including Greenways, and will serve to **inform future planning and project delivery decisions** in relation to walking and cycling infrastructure for the remainder of the decade.” p.61

“Transport Infrastructure Ireland will work with key stakeholders, including the NTA, to develop a **National Cycling Network Strategy** which will both map existing cycling infrastructure and identify gaps where future investment could be focused in order to **establish a comprehensive and connected cycling network around Ireland**. Given its national focus, this Strategy will encompass both urban and rural areas, and will be a valuable resource in relation to active travel connectivity around Ireland.” p.84



The NCN will act as the core network connecting towns, cities and destinations across Ireland





Proposed NCN

- Total length of NCN: ~3,500km
- Corridors are 4km wide and do not include design information





Proposed NCN

- Total length of NCN: ~3,500km
- Corridors are 4km wide and do not include design information
- NCN links in with existing networks e.g. EuroVelo 1 and NI Greenway Network
- NCN makes use of existing and proposed greenways where appropriate.





Proposed NCN

- Total length of NCN: ~3,500km
- Corridors are 4km wide and do not include design information
- NCN links in with existing networks e.g. EuroVelo 1 and NI Greenway Network
- NCN makes use of existing and proposed greenways where appropriate.
- NCN connects over 200 cities, towns and villages.



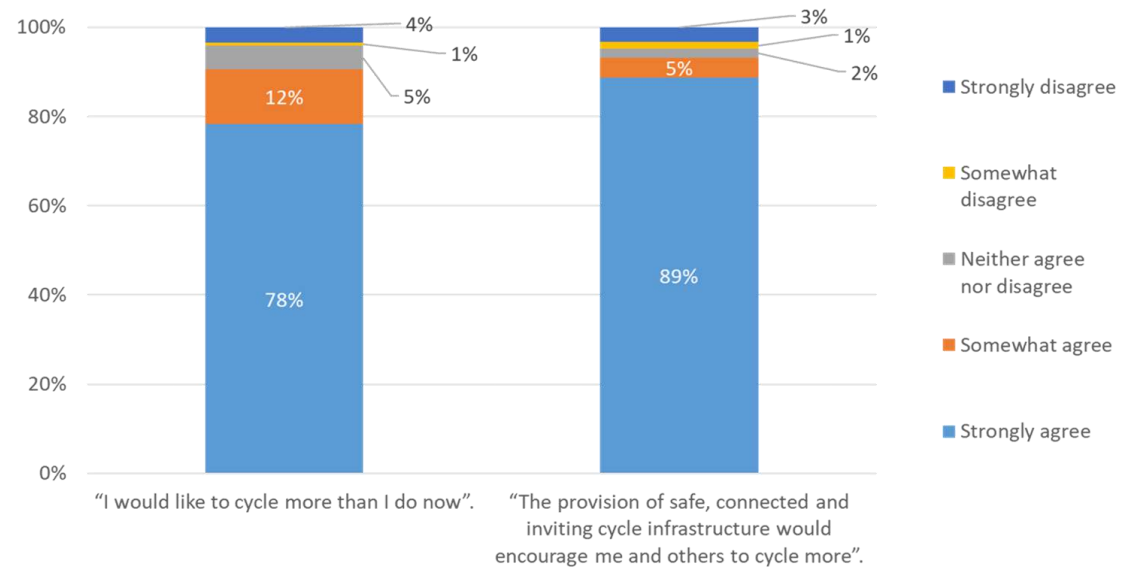


Public consultation

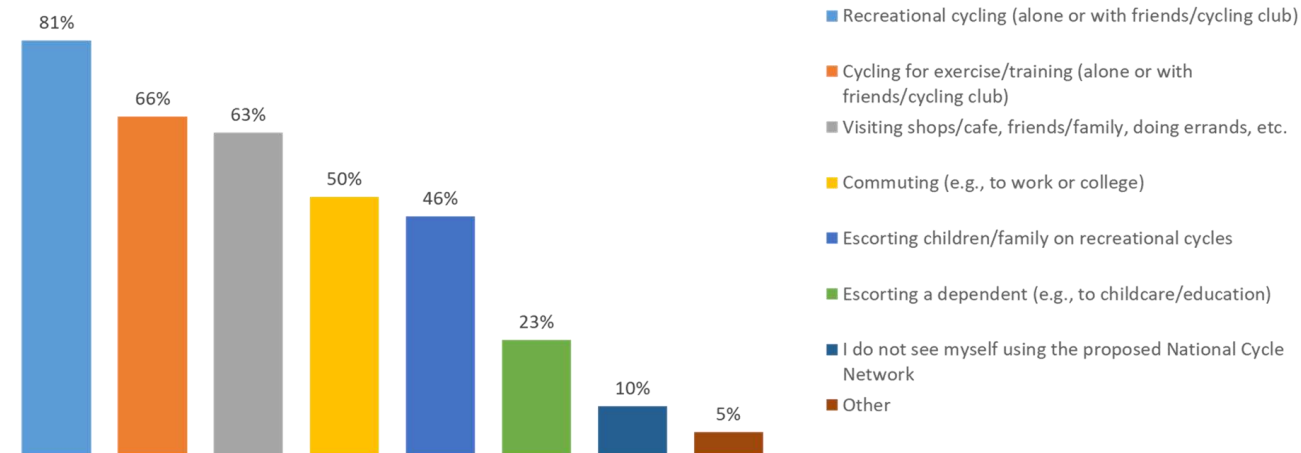
- Consultation period May – June 2022
- Over 1,400 online submissions received
- Key issues identified:
 - Safety
 - Segregation
 - Incorporating and upgrading existing infrastructure
 - Leisure and recreational function
 - Access and integration



Public consultation



Do you see yourself using the proposed National Cycle Network for any of the following trip types?





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association



NCN Plan Implementation Strategy



Planned and delivered as a single programme to ensure a coherent and integrated approach

A consistent standard of infrastructure across all projects

Adhere to the NCN Plan objectives

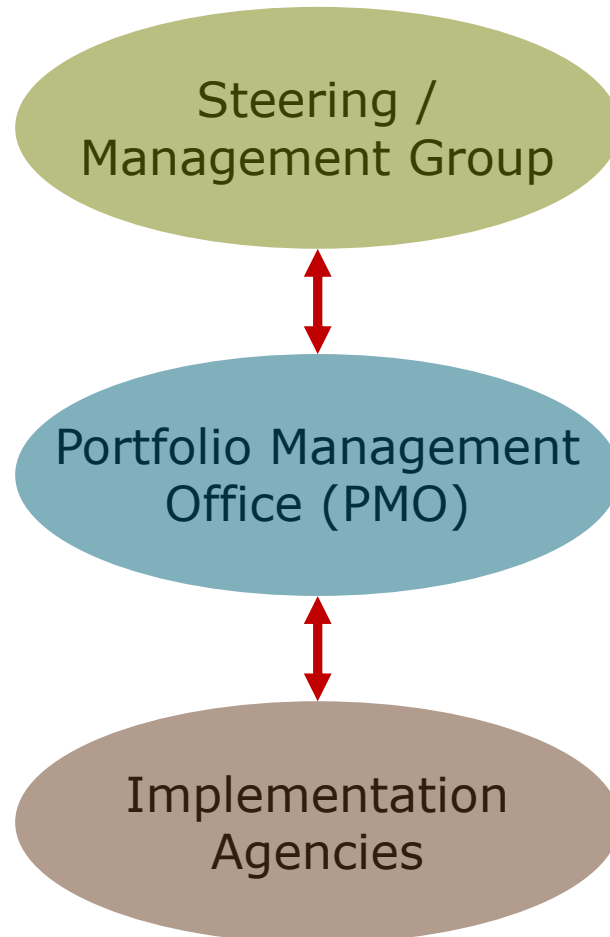
Branding and marketing

A coherent network, with regional balance

Ongoing monitoring and evaluation



Implementation Governance



- Chaired by DoT
- NTA
- CCMA
- TII

- Portfolio Planning & Funding
- Coordination & Consistency
- Stakeholder Engagement
- Approving Authority

- Primarily Local Authorities

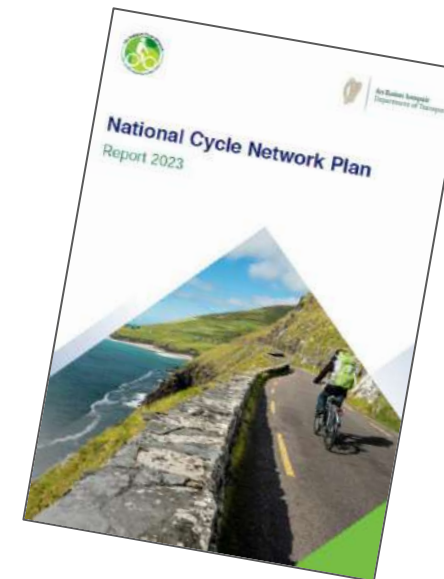


	Phase 1 (2023-2025)	Phase 2 (2026-2030)	Phase 3 (2031-2040)	Total
Approximate kilometres delivered	330km	660km	2,510km	3,500km

Greenway Retrofit	310km
New Greenways	210km
NTA Funded Urban Active Travel	165km
Dungarvan to Youghal Pathfinder	35km
Hard Shoulder Repurpose	200km
National, Regional, Local Road active travel	70km
TOTAL	990km



- NCN to be funded through existing funding envelopes up until 2030 including:
 - Greenways funding of approx. €60m per annum
 - National and Regional/Local Roads active travel funding
 - NTA active travel funding
- Maximum reuse of existing infrastructure:
 - Road space Reallocation
 - Use of Quiet Roads





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

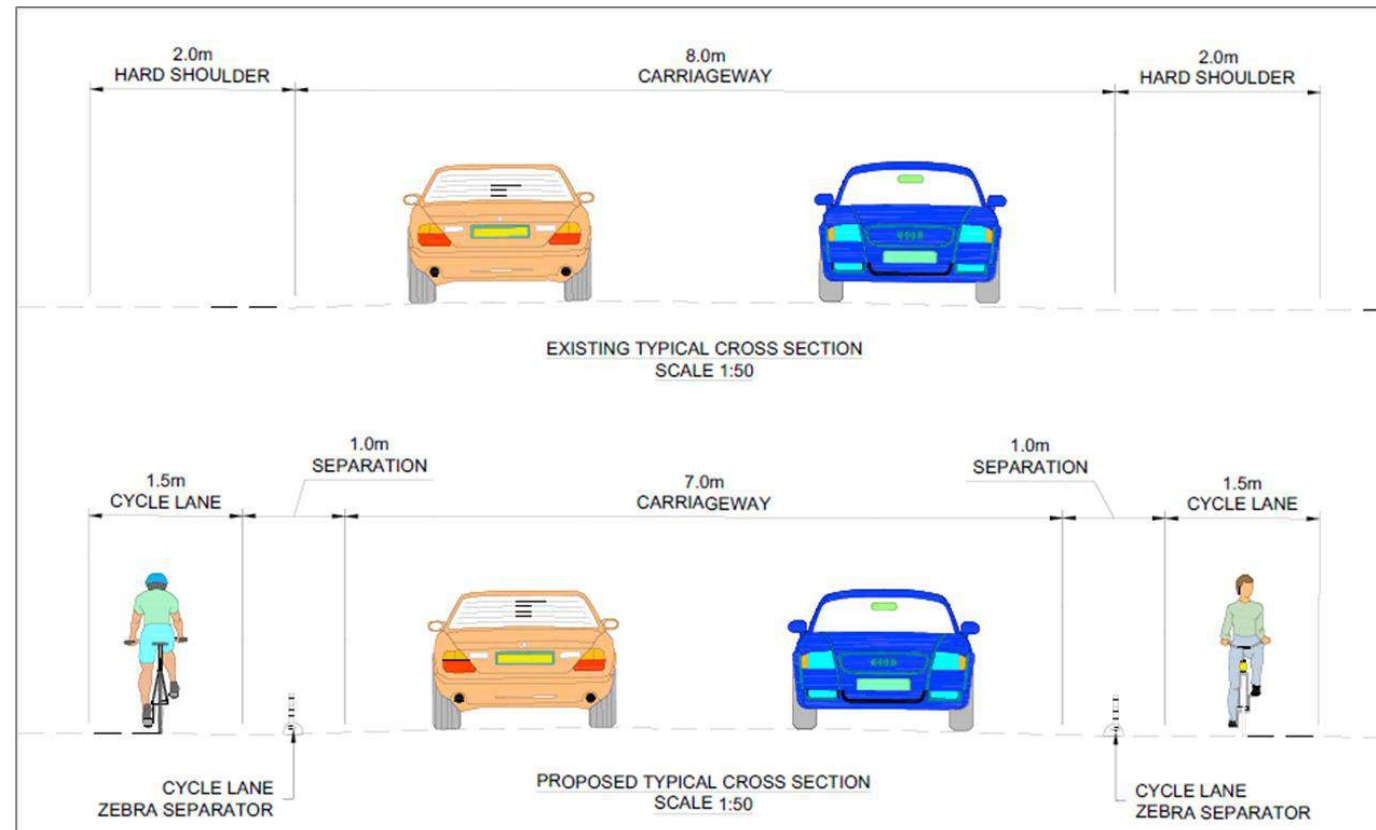
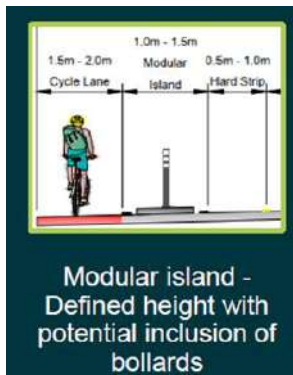
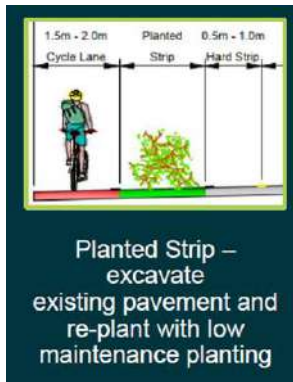


Roadspace Reallocation Pilots





- Physical Segregation
- No impact on existing drainage regime
- Able to be maintained

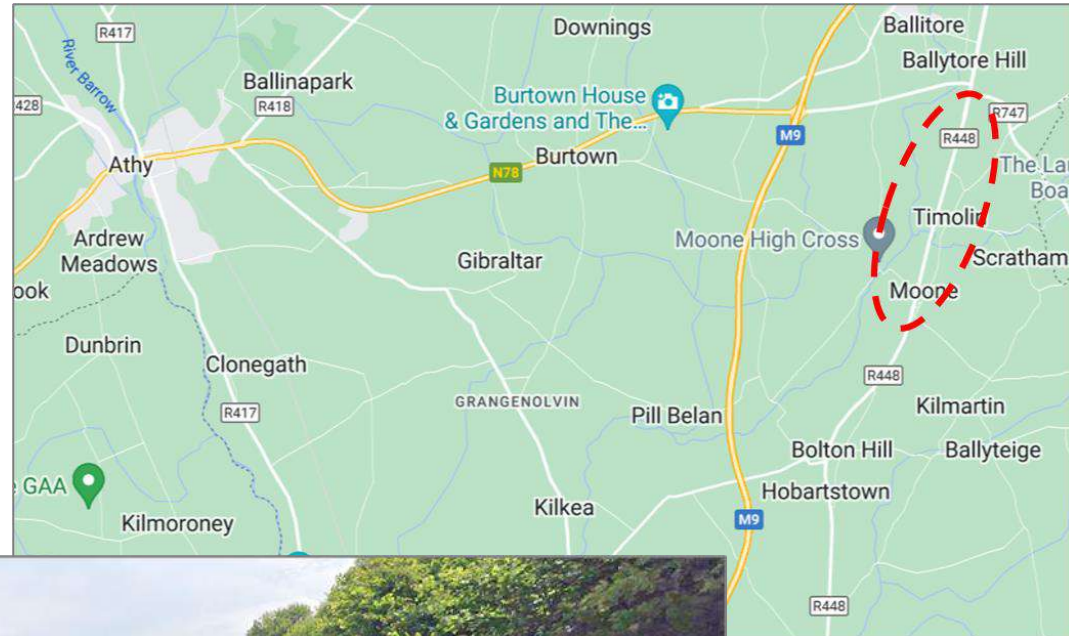


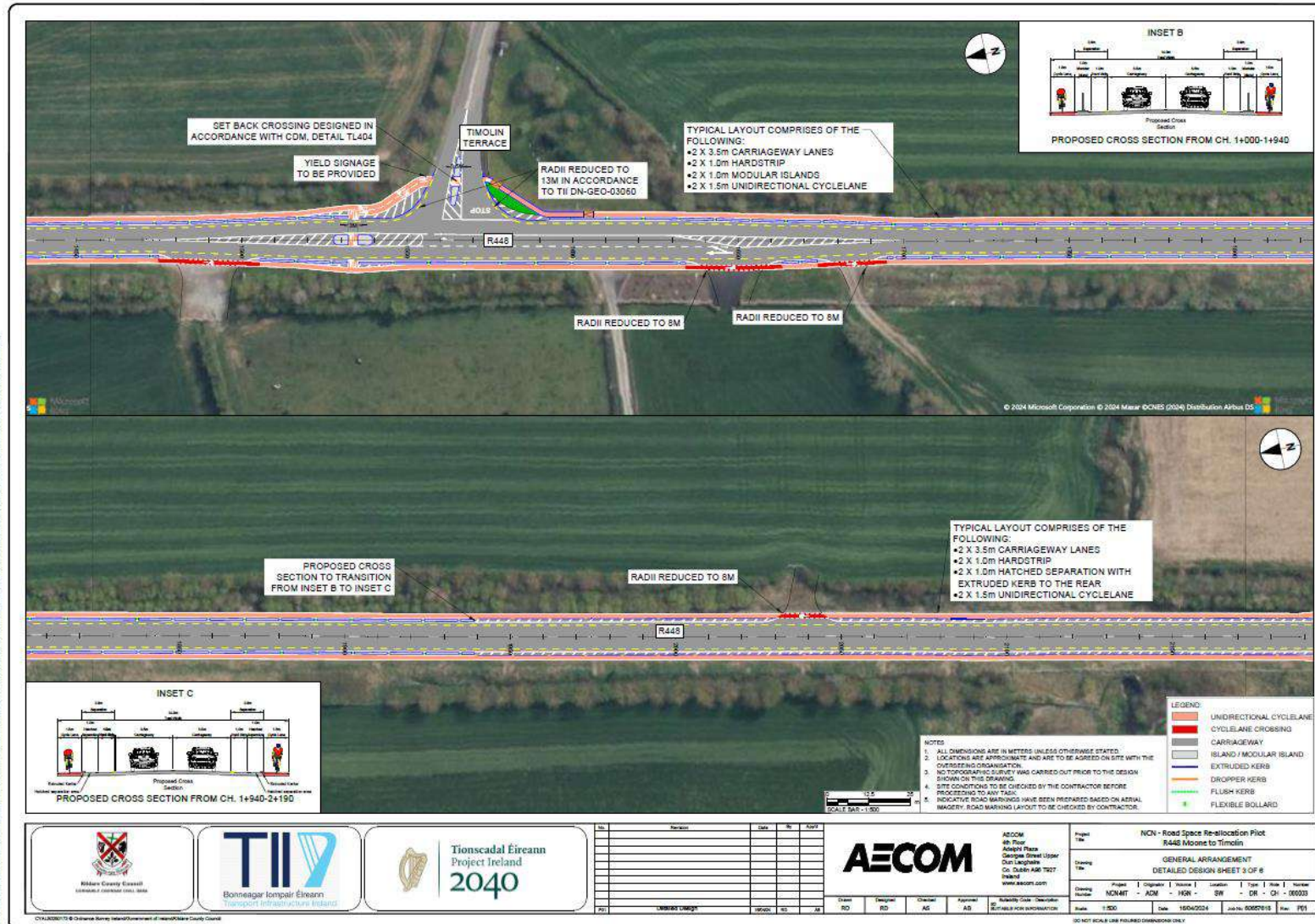


Roadspace Reallocation Pilot

R448 Moone to Timolin

- Former N9
- Circa 3.5km







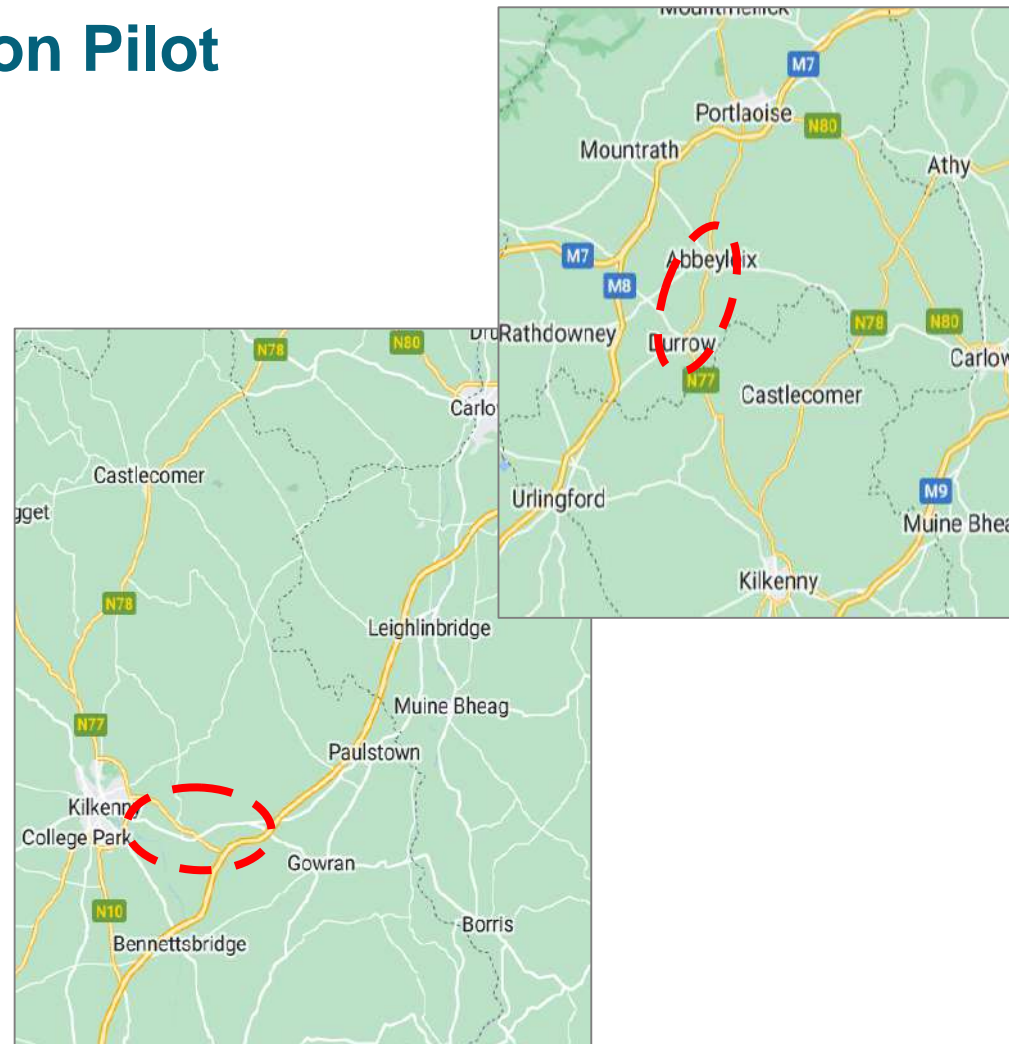
Roadspace Reallocation Pilot

N77 Abbeyleix to Durrow

- Circa 8.5km
- On Kilkenny to Portlaoise NCN route

R712 Kilkenny to Clara

- Former N10
- Circa 7.0km
- On Kilkenny to Carlow / Wexford NCN route







An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association



Quiet Roads Pilot



Quiet Roads

Shared Space



"2 - 1" Road







An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association



Concluding Remarks



Thank You

Questions to be entered through SLIDO when entering your question please direct it to **Richard Bowen** and they will be addressed at the end of the session:

Slido.com and enter 5812867
Or via the QR Code





An Roinn Iompair
Department of Transport



Cumann Lucht Bainistíochta Contae agus Cathrach
County and City Management Association

RSTG Conference 2023 16th May - Day 2

Networking \ Exhibition & Coffee Break

We will resume at 11.30 am

Session 2-Road Design Supporting an Aging Population & Training Update

Chair Gareth McMahon

11.30-11.50	Age Friendly Ireland - Road Design Supporting an Aging Population	Declan Gaffney and Catherine McGuigan - Meath County Council
11.50-12:10	SETU - Certificate in Road Programme Management & LASNTG Training Update	John Corry - Clare County Council and Shane O'Dwyer - LASNTG

Join the Q&A session at [Slido.com](https://www.slido.com) and enter 5812867
Or via the QR Code

