

Submission No.			73	
Organisation Name or Name of Submitter			Dublin Cycling Campaign	
Item No.	Section Ref.	Page No.	Observation Statement	TII Response
RE: MetroLink Railway Order (Case: 314724)				
1	3.0 Requested Conditions	2	<p>Request that ABP consider two modifications via condition for this project:</p> <p>1. To increase the levels of bike parking provided at five stations: Northwood, Ballymun, Collins Avenue, Glasnevin and Tara Street.</p> <p>2. The second to require the hundreds of HGVs required at each construction site to be direct vision vehicles, which have no major blind spots - see https://tfl.gov.uk/info-for/deliveries-in-london/delivering-safely/direct-vision-in-heavy-goods-vehicles. This will significantly reduce the traffic hazard to the most vulnerable road users: pedestrians and cyclists.</p>	The following responses cover these two core observations and the supporting detail provided with this submission.
2	3.1 Increase Cycle Parking Provision at City Centre Stations	2	The provision at many stations falls well below the predicted demand. In particular of note are Northwood (38%), Ballymun (45%), Collins Avenue (37%), Glasnevin Metro + Rail (43%), Tara Metro + DART (13%).	<p>As set out by EIAR Chapter 6, MetroLink Operations and Maintenance, due to space constraints in the vicinity of stations in the DCC area, it has not been possible to provide 100% of bicycle parking required to meet demand at every station. However, the maximum number of bicycle parking has been provided at each station taking cognisance of available space. EIAR Chapter 31, Summaries of the route wide mitigation and monitoring proposed, goes on to further note (Mitigation Reference TT19) that cycle parking provisions per station will be monitored to ensure that the level of provision is meeting the demand. Similarly, the volume and type of cycle parking provisions required may change over the course of the Operational Phase due to the ongoing shift to shared and micro mobility solutions.</p> <p>Notwithstanding the above. TII does agree that there is a need for high density cycle parking into the future to accommodate demand from the Project, as well as demand from the general increase in cycling forecasted within the City. In recognising the shortfall, meeting this demand will require a coordinated multi-agency approach to ensure efficient delivery of cycle parking spaces and facilities. There is a clear mix of uses in the areas surrounding MetroLink stations, which may see cycle demand in varying peak times. As a result, it requires a combined approach and delivery from multiple agencies, e.g. Dublin City Council, Fingal County Council, NTA, TII and Irish Rail, to identify how future demand can be accommodated sustainably and the maximum benefits of the parking achieved. This will include the consideration of available land, but noting such land is often already allocated as part of future development plans. TII anticipate cycle parking provisions are likely to involve a combination of fixed and shared bicycles and other facilities to support the delivery of mobility hubs across the region.</p>
3	3.1 Increase Cycle Parking Provision at City Centre Stations	3	<p>Appendix A4.1 section 3.2.2 suggests that "Shared Mobility Solutions' (aka bike sharing) means that the provision of adequate cycle parking is not required. In particular, quoting research by TCD Associate Professor Brian Caulfield in 2018 to back up the following statement in the EIAR that "due to the short journeys usually taken by the Dublin Bikes and Bleeper Bikes, the turnover can be very high day to day, with a station turnover ratio of slightly more than 1:5 to the station capacity". No reference is provided for the paper's name.</p> <p>After contacting Brian Caulfield he believes the paper they are referencing is "Effectiveness of Small Scale Bike Sharing Systems According to the Analysis of Turnover Station Ratios" (Jimenez, Nogal, Caulfield, 2018). That research paper does not support the statement in section 3.2.2 that "an assumption can be applied to this scenario whereby 1 space on a public bicycle parking rack for shared mobility could facilitate 5 shared bicycle parking events during the 3-hour peak period used for calculating the potential demand."</p>	<p>Appendix A4.1 suggests the use of shared mobility solutions may assist in accommodating the anticipated demand for cycle parking. It does not suggest that adequate cycle parking is not required. As noted in response item (2) above, TII agree that there is a need for high density cycle parking provision into the future to accommodate demand from the Project, and demand across the city, but meeting the shortfall will require a coordinated multi-agency response.</p> <p>The statement of turnover ratio of station capacity has been erroneously referenced. The 2016 paper 'Perceptually important points of mobility patterns to characterise bike sharing systems: The Dublin case) by Jiménez et al. should have been referenced here instead. As noted in Appendix A4.1, a limited amount of data was available at the time of writing, leading to the development of an assumption which was used to demonstrate 'the potential number of users who can be accommodated by the proposed number of spaces during the 3-hour peak period.' As an assumption only, the turnover ratio of events per 3 hour peak period was not explicitly based upon data in the aforementioned paper, as it looked at station capacity turnover rather than individual parking events.</p>

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4	3.1 Increase Cycle Parking Provision at City Centre Stations	3	<p>The applicant makes the argument that there is limited space to provide cycle parking at stations where there is under provision. However, if you look at Griffith Park station the applicant is specifically building an underground cycle parking space to provide the necessary space.</p> <p>Adjacent to the Ballymun and Northwood stations, where the proposed cycle parking will only cover 38% and 45% of the predicted cycle demand respectively, there is ample space adjacent to the station for TII to build the cycle parking necessary to support the predicted demand in the opening year.</p> <p>Our biggest concern is at Tara Street station. Again the applicant argues there is not enough space to provide the necessary cycle parking. The applicant is CPO'ing the whole block so adjacent land is within their control. The vast majority of the site post-construction is marked for "future development by others". TII could use that space for cycle parking in the interim. TII could condition the future development land to include cycle parking for the metro and train station within the new development.</p> <p>TII makes unfounded arguments that shared bike schemes will lessen the need for cycle parking at stations like Tara Street. Even still, their proposals include removing the existing Dublin Bikes station outside of the Constant Markiewicz centre for construction and not reinstate it post-construction (MetroLink Structures Tara Station Proposed Street Level Design - Sheet 1).</p> <p>The other option the applicant should consider is the use of two-tier cycle parking racks. They provide cycling parking at increased densities, making them more suitable for locations with limited space. Two-tier cycle parking racks are not a replacement for the standard Sheffield stand so two-tier racks do not support cargo bikes, tricycles, bikes with large front baskets or rear child seats. Attached at the end of this document are two photos of a two-tier cycle parking hub in Waltham Forest, London, UK.</p> <p>In summary, we suggest that it is possible to comply with the predicted cycle parking demands:</p> <p>At Ballymun and Northwood provide more cycle parking in adjacent land.</p> <p>At Tara Street TII will own the adjacent land and could use it to provide the cycle parking they are required to provide. Reinstate Dublin Bike stations near the station.</p> <p>At all locations consider the use of two-tier cycle parking racks to increase densities where space is constrained.</p>	<p>Please refer to response item (2) above in relation to the coordinated response required to deliver cycle parking within Dublin. As noted, this will include the consideration of available land, but noting such land is often already allocated as part of future development plans. For example, at Tara Street, as noted in your observation, the adjacent site space is marked for 'future development by others'. This land could be developed under a separate planning application post MetroLink becoming operational, and therefore additional cycle parking provision could be provided as part of that development. This requires a coordinated agency approach, as outlined in response item (2). In a similar way, the reinstatement of Dublin Bikes at a suitable location in this area would require coordination with DublinBikes. It is noted, that although 20 DublinBikes spaces will be lost at this location, it is proposed that 256 spaces ill be provided at Tara Street as part of MetroLink.</p> <p>As noted in the Planning Report (submitted as part of the Railway Order), the lands surrounding both Northwood and Ballymun are zoned for mixed uses (such as commerical and residential development, noted in section 4.4.3.6 and 4.5.1.4 of the Planning Report), and therefore there will be in the future, a clear mix of uses in the areas surrounding MetroLink stations, which may see cycle demand in varying peak times. As a result, it requires a combined approach and delivery from multiple agencies, e.g. Dublin City Council, Fingal County Council, NTA, TII and Irish Rail, to identify how future demand can be accommodated sustainably and the maximum benefits of the parking achieved.</p> <p>TII disagree that unfounded statements have been made regarding the impact of shared bike schemes on the cycle provisions proposed. As detailed in response item (3) above, a literature review on shared bike schemes informed the assumptions that were made surrounding the potential turnover events associated with shared bike schemes. As noted in Appendix A4.1, a limited amount of data was available at the time of writing, leading to the development of an assumption which was used to demonstrate 'the potential number of users who can be accommodated by the proposed number of spaces during the 3-hour peak period.' As an assumption only, the turnover ratio of events per 3 hour peak period was not explicitly based upon data in the aforementioned paper, as it looked at station capacity turnover rather than individual parking events.</p> <p>As noted, two-tier cycle parking racks have not been utilised in the Project's design as they may preclude the parking of various other types of bikes, including cargo bikes, tricycles or accessible bikes, amongst others. However, the use of two-tier cycle parking, and the provision of other types of cycle parking, will be considered by TII during the detailed design stage and in our discussion with orther agencies involved in the delivery of cyle parking city wide.</p>	
5	3.2 Direct Vision HGVs to Reduce Traffic Hazard Risks to Vulnerable Road Users	5	<p>We are concerned about the level of road danger posed by the heavy good vehicles (HGVs) needed to construct MetroLink and that TII have not sufficiently mitigated the risk in their submitted outline Construction Environmental Management Plan.</p> <p>2. To require the hundreds of HGVs required at each construction site to be direct vision vehicles, which have no major blind spots. This will significantly reduce the traffic hazard to the most vulnerable road users: pedestrians and cyclists.</p>	<p>TII confirm that their main works contractors will be required to comply with the Direct Vision Standard (DVS) and safety permit for heavy goods vehicles (HGVs).</p>	
6	3.2.2 Impact of MetroLink on number of HGVs in Urban Areas	6	<p>Appendix A9.5 Scheme Traffic Management Plan, section 4.4.3 shows how much of an impact the HGVs required for MetroLink will increase the number of HGVs in the area. Many streets will see construction vehicle increases of 10-30% and some streets increases of over 30% (A9.5, Appendix F, Figure A.F-1 - Figure A.F-4). This will increase the risk to vulnerable road users on many city centre streets with no segregated cycling infrastructure.</p>	<p>As part of the traffic assessment presented in EIAR Appendix A9.5 Scheme Traffic Management Plan, the impact on cycle safety has been considered. A two-stage screening assessment methodology has been adopted, ensuring that any reduction in quality of service for cyclists (by one level or more) has been captured, with remedial measures including the temporary installation of cycle ways where appropriate, to minimise the impact on cyclists. Where the existing level of service cannot be maintained in the vicinity of the construction sites, alternative routes will be designated to minimise the risk to vulnerable users. As such, the traffic management measures have been designed in line with the hierarchy of road users identified in the GDA Transport Strategy, giving highest preference to pedestrians and cyclists.</p> <p>Prior to implementation, all traffic management measures will be agreed with FCC and DCC, and where relevant, consultation with An Garda Síochána and other statutory stakeholders will be undertaken to ensure the safety of use</p>	

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7	3.2.3 Mitigation Measures proposed by MetroLink	6	Appendix A5.1 Outline Construction Environmental Management Plan (CEMP) outlines the small number of mitigation measures proposed by the applicant.	<p>Please note, the assumption has been made that the submission query in this instance intends to read as 'Appendix A5.1 Outline Construction Environmental Management Plan (CEMP) outlines the small number of mitigation measures proposed by the applicant', rather than 'outsides'.</p> <p>As outlined in Appendix A5.1, the purpose of the Outline Construction Environmental Management Plan (CEMP) is to provide a framework that outlines how contractor(s) working for TII and the NTA will manage, and where practicable, minimise, potential negative environmental effects during the construction phase. It identifies the minimum requirements with regards to the appropriate monitoring, inspection and reporting mechanisms that need to be implemented throughout construction. EIAR Chapter 31 presents a summary of the route wide mitigations that are proposed for all aspects of the Project. Potential significant impacts to cyclists, and other users, have been designed out as far as possible through the development of the temporary traffic management measures, and therefore further mitigations are not required.</p>
8	3.2.3 Mitigation Measures proposed by MetroLink	6	Table 6.1 topic TT7 discusses the mitigation measures for people walking and cycling. Vague suggestions are made (by TII) about providing temporary footpaths and cycleways around construction sites.	Prior to implementation, all traffic management measures will be agreed with FCC and DCC, and where relevant, consultation with An Garda Síochána and other statutory stakeholders will be undertaken to ensure the safety of users.
9	3.2.3 Mitigation Measures proposed by MetroLink	6	Table 6.1 topic TT6 says that "Bus lanes may be temporarily converted to general traffic lanes in order to optimise the flow of traffic on the network during the Construction Phase". In many places in the city bus lanes are the only cycle infrastructure that exists. Removing bus lanes will make cycling less safe.	Please refer to response (6) above in relation to the assessment of the impact on cycle safety and proposed mitigation measures.
10	3.2.3 Mitigation Measures proposed by MetroLink	6	Report A5.3 Construction Sequence Report shows bus lanes and cycle lanes removed during some construction phases in favour of maintaining traffic lanes.	<p>Please refer to response item (6) above in relation to the assessment of the impact on cycle safety and proposed mitigation measures. Appendix A9.5 Scheme Traffic Management Plan details the temporary traffic management measures proposed and the impacts on all road users throughout the construction phase. As noted, a hierarchical approach to traffic management has been adopted with pedestrians/cyclists, public transport and commercial needs provision taking preference over private car usage. A summary of the impact of the construction works indicates that, as a result of the TTM and mitigation measures proposed, the bus network will not face any significant impacts at any location. At most locations, with the exception of Dublin Airport and Glasnevin, cycle facilities are protected. At these locations, mitigation measures have been identified to minimise the severity of the impact as far as possible.</p> <p>Prior to implementation, all traffic management measures will be agreed with FCC and DCC, and where relevant, consultation with An Garda Síochána and other statutory stakeholders will be undertaken to ensure the safety of users.</p>
11	3.2.3 Mitigation Measures proposed by MetroLink	6	Chapter 28 Risk of Major Accidents and Disasters notes that a serious or fatal collision involving construction traffic caused by the increase in HGVs could lead to an injury or fatality. This risk exists in all zones, throughout the life of the project. Table 28.9 ID C8 says that to mitigate this risk a number of actions are proposed including "Blind spot detection will be compulsory for HGVs in order to identify vulnerable road users".	TII confirm "Blind spot detection will be compulsory for HGVs in order to identify vulnerable road users". Please refer to response item (5) above in relation to the safe operation of heavy goods vehicles.
12	3.2.4 Proposed Mitigation Measures for HGVs	6	TII needs to set high standards for HGV vehicles that work on the MetroLink project. TII has a responsibility to protect vulnerable road users. The CrossRail project in the UK set a good example. It required... much stronger requirements than those described by TII in their CEMP or in Chapter 28.	Health and safety of all, whether it be the public, businesses, stakeholders, people working on the project or any other group or entity that comes in to contact with the Project, will not be compromised in anyway. As reflected by response (7) above, if there are any other safety concerns that Dublin Cycling Campaign feel would benefit from further discussion, TII would welcome this engagement.

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13	3.2.4 Proposed Mitigation Measures for HGVs	9	<p>TII's proposed mitigation measures are out of date with the best scientific evidence on how to mitigate the risk to vulnerable road users posed by HGVs. There are standards from other projects that they should implement for MetroLink.</p> <p>We request that ABP ask TII for further information on how to mitigate this risk, including how cycling will be facilitated safely around construction sites.</p> <p>We also ask ABP to require conditions on HGVs to use the latest technology improvements to reduce the risks of blind spots.</p>	<p>TII do not agree that the proposed mitigation measures are outdated. As noted by:</p> <p>Response (5) above, TII confirm that their main works contractors will be required to comply with the Direct Vision Standard (DVS) and safety permit for heavy goods vehicles (HGVs).</p> <p>Response (5) and (6) refer to how the safety of cyclists, and the details surrounding the proposed temporary traffic management measures for each construction site will be addressed; and</p> <p>Response (12) that health and safety of all is the top priority of TII and that if there are any other safety concerns that Dublin Cycling Campaign feel would benefit from further discussion, TII would welcome this engagement.</p>
14	4.0 Conclusion	9	<p>We hope that ABP decides to approve this vital public transport project with the two modifications via condition.</p> <p>Increase cycle parking at the following metro stations: Northwood, Ballymun, Glasnevin and Tara Street</p> <p>Require TII to use the latest standards for mitigating the risks of HGVs to vulnerable road users by copying working standards from other European construction projects</p>	<p>Please refer to response (13) regards mitigating risk of HGV's to vulnerable road users and response (4) regards increasing cycle parking provision.</p>