Appendix A2.1
Planning Report

Contents

List of Figures

Appendices

Acronym	Meaning
AA	Appropriate Assessment
ACA	Architectural Conservation Areas
AWB	Artificial Water Bodies
AVL	Automatic Vehicle Locator
CBC	Core Bus Corridor
CIE	Coras Iompair Éireann
DAA	Dublin Airport Authority
DCC	Dublin City Council
DCCAE	Department of Communications, Climate Action and Environment
DCDP	Dublin City Development Plan
DCENR	Department of communications, Energy and Natural Resources
DCHG	Department of Cultural, Heritage and the Gaeltacht
DTTAS	Department of Transport, Tourism and Sport
EE	Enterprise and Employment
EIA	Environmental Impact Assessment
EIAR	Environmental Impact Assessment Report
EMRA	Eastern and Midlands Regional Assembly
EU	European Union
FRA	Flood Risk Assessment
GDA	Greater Dublin Area
GDACNP	Greater Dublin Area Cycle Network Plan
GEP	Good Ecological Potential
GES	Good Ecological Status
HMWB	Heavily Modified Water Bodies
HSE	Health Service Executive
IFI	Inland Fisheries Ireland
IW	Irish Water
KDC	Key District Centre
LAP	Local Area Plan
LEV's	Low Emission Vehicles
LVSC	Liffey Valley Shopping Centre
MRC	Major Retail Centre
NAF	National Adaptation Framework
NCPF	National Cycle Policy Framework
NDP	National Development Plan
NIS	Natura Impact Statement
NIFTI	National Investment Framework for Transport in Ireland
NPF	National Planning Framework
NPO	National Policy Objective
NPWS	National Park and Wildlife Service
NSO	National Strategic Outcome
NTA	National Transport Authority
OPW	Office of Public Works
OS	Open Space
PR	Planning Report
REGEN	Regeneration
RES	Existing Residential
RPO	Regional Policy Objective

Acronym	Meaning
RSA	Road Safety Authority
RSES	Regional Spatial and Economic Strategy
RSO	Regional Strategic Outcome
SDCC	South Dublin County Council
SDCCDP	South Dublin County Council Development Plan
SDG's	Sustainable Development Goals
SDRA	Strategic Development Regeneration Area
SDRZ	Strategic Development Regeneration Zone
SEA	Strategic Environmental Assessment
SFILT	Strategic Framework for Investment in Land Transport
TII	Transport Infrastructure Ireland
UN	United Nations
WFD	Water Framework Directive

1. Introduction

This Planning Report (PR) has been prepared to set out the planning context for the development of the Lucan to City Centre Core Bus Corridor Scheme (hereafter referred to as the Proposed Scheme). It identifies and considers the existing policy framework for the Proposed Scheme in the context of relevant legislative, International, European, National, Regional and Local planning strategy, plans and policy documents.

The full extent of the Proposed Scheme is set out in Figure 1A of this Report.

The Proposed Scheme is one of 12 stand-alone Core Bus Corridor (CBC) Schemes to be delivered under the BusConnects Dublin - Core Bus Corridors Infrastructure Works (herein after called the CBC Infrastructure Works). The CBC Infrastructure Works, once completed, will deliver the radial core bus corridors identified in the Core Bus Network contained in the Transport Strategy for the Greater Dublin Area 2016 – 2035 (hereafter referred to as the GDA Transport Strategy) (NTA 2016).

The BusConnects Dublin Programme is the National Transport Authority's (NTA's) programme to greatly improve bus services in the Greater Dublin Area (GDA) and the CBC Infrastructure Works is one element of that Programme, itself containing 12 stand-alone CBC Schemes. It is a key part of the Government's policies to improve public transport and address climate change in Dublin.

1.1 Summary Description of the Proposed Scheme

The Proposed Scheme has an overall length of approximately 9.7 km. It will commence at Junction 3 of the N4 Lucan Road / Lucan Bypass where the C-Spine route terminates before splitting to branch routes and is directed east towards the City Centre (C-Spine is the Dublin Bus term for the network serving Maynooth, Celbridge, Leixlip, Lucan, Adamstown, Liffey Valley and Palmerstown). From the R136 Ballyowen Road junction with the R835 Lucan Road the Proposed Scheme will run east down the R835 Lucan Road to the roundabout serving the Lucan Retail Park and the N4 Lucan Road eastbound on slip. The Proposed Scheme will continue via the N4 (passing the Liffey Valley Shopping Centre at Junction 2) as far as the M50 Junction 7 and then via the R148 along Palmerstown bypass, Chapelizod bypass, R148 Con Colbert Road, St John's Road West, ending at Frank Sherwin Bridge, where it will join the prevailing traffic management regime on the South Quays.

The Proposed Scheme includes an upgrade of the existing bus priority, pedestrian and cycle facilities. The scheme includes a substantial increase in the level of bus priority provided along the corridor, including the provision of additional lengths of bus lane resulting in improved journey time reliability. Throughout the Proposed Scheme bus stops will be enhanced to improve the overall journey experience for bus passengers and cycle facilities will be substantially improved with segregated cycle tracks provided along the links and protected junctions, with enhanced signalling for cyclists provided. At Junction 3 of the N4, cycle facilities are provided along R136 Ballyowen Road between Hermitage Road and the R835 Lucan Road, and then along the length of the Core Bus Corridor to Junction 2 of the N4.

From there cycle facilities are provided along the Old Lucan Road either side of the M50 and through Palmerstown village, to the start of the R148 Chapelizod bypass, at which point they will connect with other future cycle facilities through Chapelizod village. Cycle facilities are also provided on the R148 between Con Colbert Road and the end of the corridor at Heuston station on St John's Road West.

Moreover, pedestrian facilities will be upgraded and additional signalised crossings will be provided. In addition, urban realm works will be undertaken at key locations with higher-quality materials, planting, and street furniture provided to enhance the pedestrians' experience.

The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor.

A full description of the Proposed Scheme is provided in Chapter 4 in Volume 2 of the Environmental Impact Assessment Report (EIAR) and the associated scheme drawings are provided in Volume 3 Figures of the EIAR. In addition, Chapter 2 and Chapter 3 in Volume 2 of the EIAR, outline the need for the Proposed Scheme and the alternatives considered, respectively.

1.2 Proposed Works Background

The GDA Transport Strategy was published by the NTA in 2016 (NTA 2016). The GDA Transport Strategy identified a 'Core Bus Network' which highlights the most important bus routes within the GDA. They were characterised by high passenger volumes, frequent services, and significant trip attractors. The GDA Transport Strategy states that it is proposed to provide continuous bus priority, as far as is practicable, along the core bus routes. This will result in a more efficient and reliable bus service with lower journey times, increasing the attractiveness of public transport in these areas and facilitating a shift to more sustainable modes of transport. The Proposed Scheme is identified as part of the 'Core Bus Network'. The GDA Transport Strategy identified Bus Rapid Transit (BRT) along the Proposed Scheme route supporting a bus-based solution.

In March 2018, BusConnects Dublin was launched as part of a major investment programme, including Metrolink and the DART Expansion Programme, to improve public transport in Dublin, as part of Project Ireland - National Development Plan 2018 – 2027 (hereafter referred to as the NDP) (Government of Ireland 2018a).

As design and planning work was progressed by the BusConnects Infrastructure team, it became clear that the level of differentiation between the BRT corridors and the CBCs would, ultimately, be limited, and that all of the radial CBCs listed here should be developed to provide a similarly high level of priority service provision (i.e. to provide a consistency in terms of bus priority and infrastructure to support all bus services).

The CBC Infrastructure Works encompasses a series of integrated actions which, together, would deliver a bus system that will enable more people to travel by bus than ever before. The Proposed Scheme is one of 12 stand-alone CBC schemes to be delivered under the CBC Infrastructure Works.

1.3 Overview for the Need for the Proposed Scheme

Chapter 2 (Need for the Proposed Scheme) in Volume 2 of the EIAR sets out in detail the need for the Proposed Scheme. The following Section provides an overview.

Our sustainable future relies on a built environment that connects people and creates inclusive societies. Sustainable transport infrastructure assists in creating more sustainable communities and healthier places while also stimulating our economic development. It contributes to enhanced health and well-being when delivered effectively.

The key radial traffic routes into and out of Dublin City Centre are characterised by poor bus and cycle infrastructure in places. Effective and reliable bus priority depends on a combination of continuous bus lanes and signal control priority at pinch-points and junctions. Currently bus lanes are available for 67% (outbound) and 77% (inbound) of the Lucan to City Centre route, with no signal control priority for buses. Cyclists must typically share space on bus lanes or general traffic lanes with only 10% of the route having segregated cycle facilities.

Private car dependency has resulted in significant congestion that has impacted on quality of life, the urban environment and road safety. The population of the Greater Dublin Area (GDA) is projected to rise by 25% by 2040 (National Planning Framework, 2018), reaching almost 1.5 million. This growth in population will increase demand for travel necessitating improved sustainable transport options to facilitate this growth.

Without intervention, traffic congestion will lead to longer and less reliable bus journeys throughout the region and will affect the quality of people's lives. The Proposed Scheme is needed in order to enable and deliver efficient, safe, and integrated sustainable transport movement along the corridor through the provision of enhanced walking, cycling and bus infrastructure on this key access corridor in the Dublin region. The objectives of the Proposed Scheme are to:

- Enhance the capacity and potential of the public transport system by improving bus speeds, reliability and punctuality through the provision of bus lanes and other measures to provide priority to bus movements over general traffic movements;
- Enhance the potential for cycling by providing safe infrastructure for cycling, segregated from general traffic wherever practicable;
- Support the delivery of an efficient, low carbon and climate resilient public transport service, which supports the achievement of Ireland's emission reduction targets;
- Enable compact growth, regeneration opportunities and more effective use of land in Dublin, for present and future generations, through the provision of safe and efficient sustainable transport networks;
- Improve accessibility to jobs, education and other social and economic opportunities through the provision of improved sustainable connectivity and integration with other public transport services; and
- Ensure that the public realm is carefully considered in the design and development of transport infrastructure and seek to enhance key urban focal points where appropriate and feasible.

The objectives outlined above relating to enhancing capacity of the public transport system and enhancing safe infrastructure for cycling are underpinned by the central concept and design philosophy of 'People Movement'. People Movement is the concept of the optimisation of roadway space and / or the prioritisation of the movement of people over the movement of vehicles along the route and through the junctions along the Proposed Scheme. The aim is to reduce journey times for modes of transport with higher person carrying capacity (bus, walking and cycling), which in turn provides significant efficiencies and benefits to users of the transport network and the environment.

Investments in high quality public transport infrastructure and systems have been proven to result in significant modal shift. Indeed, in Dublin, the Canal Cordon Report (NTA 2019a) outlined that in 2019 (prior to COVID-19 restrictions) travel by sustainable modes accounted for 72% of all trips into Dublin City, compared to 59% in 2010. This positive improvement in sustainable mode uptake was facilitated by investment in walking, cycling and bus infrastructure, Luas Cross City and the re-opening of the Phoenix Park Tunnel in addition to investments in systems such as Leap Card and Real Time Passenger Information.

The COVID-19 pandemic brought about a short-term change in travel patterns in the Greater Dublin Area (which led, for example, to fewer people using public transport and more people working from home). Travel demand and patterns of travel have now started to return to pre-pandemic levels and are anticipated to grow in line with population growth. The impacts on travel demand and patterns of travel are still dependent on the quality of the transport system, in particular the reliability of a bus service that is not constrained by general traffic congestion.

1.3.1 The Bus Network

To inform the preparation of the GDA Transport Strategy, the NTA prepared the Core Bus Network Report (NTA 2015) for the Dublin Metropolitan Area, which identified those routes on which there needed to be a focus on high capacity, high frequency and reliable bus services, and where investment in bus infrastructure should be prioritised and concentrated. The Core Bus Network is defined as a set of primary orbital and radial bus corridors which operate between the larger settlement centres in the Dublin Metropolitan Area.

The development and implementation of priority infrastructure on the Core Bus Network is to ensure that delays are minimised, reliability is improved through peak and off-peak periods and mode shift from the private car is made more attractive.

The reason for focusing on the Core Bus Network is to maximise the return on future investment in bus infrastructure and to facilitate efficient operation of bus services, thereby improving the attractiveness of public transport for a large proportion of the population of the Dublin Metropolitan Area and beyond.

The Core Bus Network Report focused on the overall existing bus service network and identified locations where the bus network is operating sub-optimally. The network is dominated by a radial network to/from Dublin City

Centre, supplemented by low frequency orbital and local bus routes serving larger destinations outside of the City Centre core.

The following methodology was employed to determine the need for the future core bus infrastructure network:

1) The existing bus network and bus infrastructure in the Dublin Metropolitan Area was analysed, including the identification, mapping and categorising of the existing bus infrastructure. This analysis identified all roads that have dedicated road space for bus, and other bus priority infrastructure such as Bus Gates, junction bus priority and bus only through routes;
2) Journey time delays of the bus network in the Dublin Metropolitan area were examined;
3) The frequency of bus services between stops during the peak period was examined to help identify where the highest volume of bus traffic is on the network;
4) A demand analysis, including a broad understanding of trip demand was undertaken; and
5) Using the above analysis, specific corridors where investment is to be prioritised in the network were identified and mapped.

Overall, at the time the Core Bus Network Report was prepared, there were approximately 213km of dedicated bus lanes in the GDA, of which 93km can be categorised as outbound and 120km can be categorised as inbound (City Centre or lower order centre as destination).

Bus lanes vary by quality, level of continuity, quality of treatment at junctions and operational times. Generally, all lanes are currently at least operational for their peak hours (i.e. morning peak for inbound and evening peak for outbound). Many are operational in both directions at both peak periods, some from 7am to 7pm and others on a 24-hour basis. Some corridors benefit from a high degree of continuity whereby bus lanes are present for long sections and are not truncated at junctions. This occurs mostly in locations where a previous full lane of traffic or a pre-existing hard shoulder has been designated as a bus lane.

The GDA Transport Strategy concluded that this high-quality Core Bus Network would form an integral part of the improved public transport infrastructure measures for the Dublin Metropolitan Area. The final resulting Core Bus Network presented in the GDA Transport Strategy represents the most important bus routes within the Dublin Metropolitan Area, generally characterised by high passenger volumes, frequent services and significant trip attractors along the routes.

The GDA Transport Strategy recognised that these corridors are generally characterised by discontinuity, whereby the corridors currently have dedicated bus lanes along less than one third of their lengths on average which means that for most of the journey, buses and cyclists are sharing space with general traffic and are negatively affected by the increasing levels of congestion. This results in delayed buses and unreliable journey times for passengers.

The GDA Transport Strategy states that it is therefore intended to provide continuous bus priority, as far as is practicable, along the core bus routes, with the objective of supporting a more efficient and reliable bus service with lower journey times, increasing the attractiveness of public transport in these areas and facilitating a shift to more sustainable modes of transport.

The Lucan to City Centre corridor currently has a high portion of inbound and outbound bus infrastructure. Currently, there is bus infrastructure provision along 77% and 67% of the corridor (inbound and outbound respectively). There are shared cycle/bus lanes along parts of the route where no dedicated cycling infrastructure is available.

The Core Bus network study included a recommended route from Lucan to the City Centre on the basis of the need to serve significant demand along this entire corridor and the need to address service deficits (lack of bus priority and associated journey time reliability) for a high level of scheduled bus services already operating along this corridor.

Despite the relatively good provision of bus lanes along the road links, bus services are regularly delayed due to congestion arising from the lack of bus priority at key locations, such as the M50 interchange, Kennelsfort Road

junction and the South Circular Road junction. This leads to journey time unreliability being experienced along the corridor at certain times during the day.

During design development, information obtained from the bus journey time data over a typical period in 2019 indicated that there is a reasonably consistent journey time along the majority of this corridor, which reflects the presence of existing bus lanes. However, as noted above there is some noticeable variation in journey time, for example between the N4 Junction 2 (Hermitage Clinic) and the R148 Palmerstown bypass / The Oval junction, at certain times during the day. This is consistent with observations on site and the lack of bus priority across the M50 and through the highly congested junctions on the Palmerstown bypass.

1.3.2 The Cycle Network

The GDA Cycle Network Plan (hereafter referred to as the GDACNP) (NTA 2013), was adopted by the NTA in early 2014 following a period of consultation with the public and various stakeholders. This plan forms the strategy for the implementation of a high quality, integrated cycle network as set out in the GDA Transport Strategy. This is further discussed in Section 3.6.5.

The predominant provision for cycling in the Dublin City Council (DCC) area, including the areas associated with the Proposed Scheme, is by means of either on street cycle lanes (both advisory and mandatory) or bus lanes. These facilities are generally of a low Quality of Service (QoS) in the city area mainly due to the lack of width for cyclists, lack of segregation and the consequent discomfort caused by large volumes of vehicular traffic sharing the road space. The GDACNP found that typically the cycle lanes achieve a QoS score of B, C or D in the SDCC Area (QoS scores are assigned on a five-point scale from A+ to D). In addition, it found that in general the QoS of many of the existing facilities within the South Dublin County Council (SDCC) area, including the areas associated with the Proposed Scheme, is moderately good at C. More information on the QoS cycling assessment criteria can be found in Chapter 6 (Traffic & Transport). It is however noted that since the production of the GDACNP several interventions have taken place – both permanent and temporary. In the case of the Proposed Scheme however only 9.9% (outbound) and 9.9% (inbound), respectively, of the route is currently providing segregated cycle tracks.

For cyclists, segregated facilities should be provided where practicable to do so. The GDACNP proposes a network of cycle links throughout the GDA, categorised, as follows:

- **Primary Routes:** Main cycle arteries that cross the urban area and carry most cycle traffic;
- **Secondary Routes:** Link between principal cycle routes and local zones;
- **Feeder Routes:** Cycle routes within local zones and/or connections from zones to the network levels above;
- **Inter Urban Routes:** Links the towns and city across rural areas and includes the elements of the National Cycle Network within the GDA; and
- **Green Route Network:** Cycle routes developed predominately for tourist, recreational and leisure purposes but may also carry elements of the utility cycle route network above. Many National Cycle Routes are of this type.

There are primary (Routes 6, SO5) and secondary (Routes SO4, SO6, NO5) cycle routes identified along the Proposed Scheme. The route also interchanges with the Liffey Greenway and N06 Greenway. During the course of the analysis carried out to identify the Proposed Scheme, the provision of these cycle routes was considered at all stages.

Primary Route 6 follows the route of the Proposed Scheme from Lucan to the western end of the Chapelizod bypass and Secondary Route 6A follows the route of the Proposed Scheme from Con Colbert Road to Heuston station.

Other routes that interact with the Proposed Scheme are:

Primary Routes:

- S05 which intersects with the Proposed Scheme at Liffey Valley

Secondary Routes:

- S06 intersects with the Proposed Scheme at Ballyowen Road;
- NO5 intersects with the Proposed Scheme at Liffey Valley;
- 6A intersects with the Proposed Scheme at Con Colbert Road and then runs along the full length of St. John's Road West; and
- C3 intersects with the Proposed Scheme at Dr Steeven's Lane.

Feeder Routes:

- The Feeder route along Kennelsfort Road crosses the Proposed Scheme at Palmerstown; and
- The Feeder route along Woodfarm Avenue meets the Proposed Scheme at The Oval junction in Palmerstown;

Greenways:

- The Liffey Greenway is connected to the Proposed Scheme via Secondary Route NO5 at Liffey Valley;
- NO6 intersects with the Proposed Scheme at Memorial Road and provides another connection to the Liffey Greenway; and
- The River Camac Greenway intersects with the Proposed Scheme at Military Road.

It is noted that the Draft Greater Dublin Area Cycle Network Plan 2021 has been published for consultation, as part of the review of the GDA Transport Strategy and this has been considered at Section 3.6.6.

1.3.3 Infrastructure Works

1.3.3.1 The Core Bus Network Development

In Section 5.5.4 of the GDA Transport Strategy (NTA 2016) it states that *'[a] number of the Core Radial Bus Corridors are proposed to be developed as Bus Rapid Transit routes, where the passenger numbers forecast on the routes are approaching the limits of conventional bus route capacity.'*

As design and planning work was progressed by the BusConnects Infrastructure team, it became clear that the level of differentiation between the Bus Rapid Transit (BRT) corridors and the Core Bus Corridors (CBC) would, ultimately, be limited, and that all of the radial CBCs should be developed to provide a similarly high level of priority service provision (i.e. to provide a consistency in terms of bus priority and infrastructure to support all bus services).

The Proposed Scheme connecting Lucan to the City Centre serves a significant public transport demand between these locations.

The Dublin Area Bus Network Redesign Revised Proposal (October 2019) (NTA 2019) presented information on 'patterns of demand'. Image 2.4 in Chapter 2 (Need for the Proposed Scheme) in Volume 2 of the EIAR is an extract of the Combined Activity Density map for areas local to the Proposed Scheme, which combines residential, employment, and student enrolment densities to approximate the total effect of all densities in representing potential demand for public transport.

1.3.3.2 The Local Transport Need

The local transport need supporting the Proposed Scheme is summarised in this Section, with the existing baseline transport environment presented in further detail in Chapter 6 (Traffic & Transport) of the EIAR.

There are sections along the route of the Proposed Scheme with poor bus priority resulting in poor journey time reliability particularly at peak times. Automatic Vehicle Locator (AVL) data from existing bus services operating along the Proposed Scheme corridor has been used to examine the current standard deviation for bus services along the corridor, as shown in Table 1.1

Table 1.1: Current Bus Journey Time Standard Deviation (minutes)

Corridor	AM Peak Inbound	PM Peak Inbound	AM Peak Outbound	PM Peak Outbound
Lucan to City Centre	9.82	7.65	4.20	7.92

The AVL data indicates that current bus journey times have a standard deviation of approximately 10 minutes along the route of the Proposed Scheme and with any further increase in traffic levels these issues are expected to be exacerbated. In addition to impacting on bus passengers, longer and less reliable bus services also require operators to use additional buses to maintain headways to fill gaps in the timetable. Aligned to this, remaining sections of un-prioritised network can lead to clustering of buses which, in turn, means stops can become overcrowded, creating delays in boarding and alighting and the imbalanced use of bus capacity.

Within the extents of the Proposed Scheme approximately 10% of the route has a form of segregated cycling. The majority of the existing cycling facilities consist of non-segregated cycle lanes with approximately 1.6km inbound and 2.3km outbound. This infrastructure would not comply with the Proposed Scheme objectives for the most part and has been significantly enhanced along the corridor with up to 90.5% of segregated cycle facilities proposed along the corridor consisting of approximately 6.7km inbound and 6.7km outbound. The western end of the Proposed Scheme also provides a quiet road treatment for cycling through Hermitage Park, along Hermitage Road to Ballyowen Road. Cycling infrastructure will be offline along quieter routes in locations such as Old Lucan Road and Palmerstown Village, which will provide cyclists with a higher-quality environment, and is deemed to be an improved intervention from the existing conditions.

One of the key objectives of the Proposed Scheme is to enhance interchange between the various modes of public transport operating in the city and wider metropolitan area. The CBC Infrastructure Works, including the Proposed Scheme, are developed to provide improved existing or new interchange opportunities with other existing and planned transport services, including:

- DART stations;
- Existing Dublin Bus and other bus services;
- The Greater Dublin Area (GDA) Cycle Network Plan;
- Future public transport proposals such as the DART+ Programme and MetroLink; and
- Supporting the Dublin Bus Network Re-design.

The Proposed Scheme commences at Junction 3 of the N4 Lucan Road / Lucan Bypass and is directed east towards the City Centre. From the R136 Ballyowen Road junction with the R835 Lucan Road the route runs east down the R835 Lucan Road to the roundabout serving the Lucan Retail Park and also the N4 Lucan Road eastbound slip. It is then routed via the N4 (passing the Liffey Valley Shopping Centre) as far as Junction 7 (M50) and via the R148 along the Palmerstown Bypass, Chapelizod Bypass, Con Colbert Road, and St John's Road West, where it will join the prevailing traffic management regime or a separate project, the Liffey Cycle Route Scheme currently proposed by DCC, on the South Quays.

Along the route of the Proposed Scheme, there are a number of amenities, village and urban centres which experience high pedestrian usage such as Ballyowen Road, Liffey Valley Shopping Centre, Palmerstown, Chapelizod, South Circular Road, and Heuston Station. In order to improve accessibility to jobs, education and other social and economic opportunities through the provision of an integrated sustainable transport system, there needs to be a high-quality pedestrian environment.

The Proposed Scheme includes significant improvements to the pedestrian environment along the entirety of its route in terms of footpath improvements and through upgrading facilities for pedestrians at junctions and crossings, thereby addressing existing level of service deficiencies and enhancing the pedestrian environment. In terms of the need to improve facilities for cyclists as referenced in Section 1.3.2, as part of the GDA Cycle Network Plan there is one primary cycle routes (Cycle Route 6), as well as Secondary Cycle Routes (including SO6, NO5 and 6A) along the route of the Proposed Scheme. The route also interchanges with the Liffey Greenway and N06 Greenway.

Within the extents of the Proposed Scheme there are mandatory cycle lanes provided on only approximately 12.5% and 0.6% of the route outbound and inbound respectively, while advisory cycle lanes are provided on only approximately 8.1% and 10.8% of the route outbound and inbound respectively, with segregated facilities provided on 9.9% and 9.9% of the route outbound and inbound respectively. The remaining extents have no dedicated cycle provision or cyclists must cycle within the bus lanes provided. Cycle facilities in the Proposed Scheme will increase approximately 90.5% being segregated and the remainder sharing the space with quiet roads. There are also several uncontrolled crossings along the route of the Proposed Scheme, particularly at side roads where they are generally of poor standard, including lack of provision for the mobility and visually impaired. These are all proposed to be upgraded as part of the Proposed Scheme. The Proposed Scheme will therefore provide safe, segregated cycling infrastructure throughout and as such is greatly enhancing the potential for cycling and addresses many of the deficiencies in the existing network.

The Lucan to City Centre Corridor comprises one of the busiest bus routes in Dublin, carrying over 9,000 passengers in the peak periods (NTA 2017). The primary bus routes (prior to implementation of the revised Bus Network) along the corridor are listed below:

- Route 4 – Dublin to Waterford;
- Route 18 – Palmerstown to Sandymount;
- Route 20 – Dublin Airport to Galway;
- Route 22 – From Ballina to Dublin;
- Route 23 – From Sligo to Dublin;
- Route 25 – From Lucan to Merrion Square;
- Route 25A – From Lucan to Merrion Square;
- Route 25B – From Adamstown to Merrion Square;
- Route 25D – From Adamstown Rail Station to Merrion Square;
- Route 25X – From Lucan to University College Dublin (Express);
- Route 26 – Liffey Valley Shopping Centre to Merrion Square;
- Route 51D – Clondalkin to Aston Quay (Express);
- Route 66A – From Leixlip to Merrion Square;
- Route 66B – From Castletown to Merrion Square;
- Route 66X – Maynooth to University College Dublin;
- Route 67 – From Maynooth to Merrion Square;
- Route 67X – From Celbridge to University College Dublin;
- Route 79A – Parkwest to Aston Quay;
- Route 115 – From Dublin to Mullingar;
- Route 120 – Edenderry to Dublin;
- Route 126 – Rathangan to Dublin;
- Route 145 – Ballywaltrim to Heuston Station;
- Route X8 – Cork to Dublin;
- Route X12 – Limerick to Dublin; and
- Route X20 – Galway to Dublin.

As part of the BusConnects revised bus network proposals, the Proposed Scheme will serve the C-Spine bus services. Figure 2.7 in Chapter 2 (need for the Proposed Scheme) of volume 2 of the EIAR, is an extract from New Dublin Area Bus Network Map (NTA 2020) and shows the C-Spine interface with the Proposed Scheme. Demand for travel by bus is anticipated to continue to grow in this corridor into the future, in line with population growth. The bus priority measures forming part of the Proposed Scheme are required to accommodate this growth in travel demand and to facilitate the revised bus network (C-Spine) by providing journey time savings and reliability for passengers. This will ensure that the projected growth in passenger demand is facilitated and protected from increasing congestion, providing resilience which can in the future cater for additional bus service provision.

1.4 Overview of the Benefits of the Proposed Scheme

The Proposed Scheme has been designed to facilitate improved efficiency of the transport network through the improvement of the infrastructure for active walking, cycling and public transport modes making them attractive alternatives to car-based journeys. Central to the design is the optimisation of roadway space with a focus on the movement of people rather than vehicles along the route and through the junctions. A typical double-deck bus takes up the same road space as three standard cars but typically carries 50-100 times the number of passengers per vehicle. On average, a typical double-deck bus carries approximately 60-70 passengers making the bus typically 20 times more efficient in providing people movement capacity within the equivalent spatial area of three cars. These efficiency gains can provide a significant reduction in road network congestion where the equivalent car capacity would require 50 or more vehicles based on average occupancy levels. Consequently, by prioritising the movement of bus over cars, significantly more people can be transported along the limited road space available. Similarly, cyclists and pedestrians require significantly less roadway space than general traffic users to move safely and efficiently along the route. Making space for improved pedestrian and cycle infrastructure can significantly benefit these sustainable modes and encourage greater use of these modes.

The Proposed Scheme design involves the prioritisation of People Movement, focusing on maximising the throughput of sustainable modes (i.e. Walking, Cycling and Bus modes). A quantitative people-movement assessment, as part of the transport impact assessment, facilitates a comparison of the Do Minimum and Do Something peak-hour scenarios for the forecast years (2028 and 2043). The benefits resulting from the Proposed Scheme include a 24% in the number of people travelling by bus, an increase of 56% in people walking or cycling, and a reduction of 4% in the number of people travelling by car along the Proposed Scheme.

The transport modelling also presents demand outputs for people movement by bus in terms of passenger loadings along the corridor. The results indicate that the improvements in bus priority infrastructure with the Proposed Scheme in place show a substantial increase in bus patronage during the peak hours.

A key objective of the Proposed Scheme is to enhance the potential for cycling along the route. Without the provision of cycling infrastructure, intended as part of the Proposed Scheme the Quality of Service along the route would be insufficient to attract new cyclists. Currently within the existing extents of the Proposed Scheme there are segregated cycle tracks on approximately 10% and 10% of the route outbound and inbound respectively, while non-segregated cycle facilities are provided on only approximately 21% and 11% of the route outbound and inbound respectively. The remaining extents have no dedicated cycle provision or cyclists must cycle within the bus lanes provided. The proposed scheme is implementing safe, segregated infrastructure throughout and as such is greatly enhancing the potential for cycling. In addition to this, the significant segregation and safety improvements to walking and cycling infrastructure that is a key feature of the Proposed Scheme will further maximise the movement of people travelling sustainably along the corridor. All of these changes combined will therefore cater for higher levels of future sustainable population and employment growth.

The Proposed Scheme will make significant improvements to pedestrian infrastructure through the provision of an increased number signal crossings, introduction of traffic calming measures, improved accessibility, increased pedestrian directness and wider footpaths and crossings. The number of pedestrian signal crossings will increase by approximately 35% as a result of the Proposed Scheme. The scheme design has been developed in accordance with the relevant accessibility guidance. It is anticipated that the overall quality of pedestrian infrastructure will improve as a result of the Proposed Scheme. This aligns with the overarching aim to provide enhanced walking infrastructure on the corridor. The improved walking and cycling measures that the Proposed Scheme will provide will enhance the potential to grow these modes into the future.

The Proposed Scheme will address sustainable mode transport infrastructure constraints while contributing to an overall integrated sustainable transport system as proposed in the GDA Transport Strategy. It will increase the effectiveness and attractiveness of bus services operating along the corridor and will result in more people benefiting from faster journey times and improved journey time reliability.

This in turn will facilitate the increase in the bus network capacity of services operating along the corridor and thereby further increase the attractiveness of public transport. In addition, the significant segregation and safety improvements to walking and cycling infrastructure that are a key feature of the Proposed Scheme will further

maximise the movement of people travelling sustainably along the corridor and will therefore cater for higher levels of future population and employment growth. In the absence of the delivery of the Proposed Scheme, growth along this key corridor would continue to contribute to increased traffic congestion and operational issues on the road network. The Proposed Scheme delivers a reliable alternative to car-based travel that can support future sustainable growth and contribute positively towards reducing carbon emissions.

In the absence of the Proposed Scheme bus services will operate in a more congested environment, leading to higher journey times for bus and lower reliability which will lead to reduced levels of public transport use, making the bus system far less attractive and less resilient to higher levels of growth. The absence of walking and cycling measures that the Proposed Scheme will provide would significantly limit the potential to grow those modes into the future. In addition to the public transport benefits, the Proposed Scheme will also improve the existing streetscape / urban realm setting along the corridor. This will include the introduction of new and improved landscaping provisions along the corridor, and a complimentary planting regime and streetscape improvements at key locations will also enhance the character of the surrounding built environment along the corridor.

The Proposed Scheme and its objectives fit within the current planning frameworks that are described further below. The Proposed Scheme will help deliver many of the objectives on an international, national, regional, and local level.

Overall, the Proposed Scheme will make a significant contribution to the overall aims and objectives of BusConnects, the GDA Strategy and allow the city to grow sustainably into the future, which would not be possible in the absence of the Proposed Scheme.

2. Detailed Description of the Proposed Scheme

2.1 N4 Junction 3 to M50 Junction 7 – N4 Lucan Road

This section of the Proposed Scheme runs from Junction 3 on the N4 Lucan Road / Lucan bypass, as far as M50 Junction 7 and, as described below, will include upgrades to the following junctions to provide bus priority and enhanced pedestrian and cyclist facilities:

- R136 Ballyowen Road / R835 Lucan Road;
- R136 Ballyowen Road / N4 Junction 3;
- R136 Ballyowen Road / Hermitage Road;
- N4 Junction 2; and
- N4 / M50 Interchange (Junction 7).

At the start of the Proposed Scheme at Junction 3 on the N4 Lucan Road / Lucan bypass modifications are proposed to the signalised junction at the end of the N4 westbound off-slip, including the removal of the left-turn slip lane. In order to provide priority for buses and maintain adequate junction capacity for general traffic, the existing lane configuration is maintained on the bridge carrying the R136 Ballyowen Road over the N4. A two-way segregated cycle track is proposed on the east side of the R136 Ballyowen Road between R835 Lucan Road and Hermitage Road, including a new pedestrian and cycle bridge across the N4, which will replace the existing pedestrian only bridge at this location.

At the R136 Ballyowen Road junction with the R835 Lucan Road, it is proposed to remove the existing left-turn slip lanes. Additionally, the location of the existing east bound bus stop on the R835 Lucan Road will be moved closer to the junction and will also be increased in length. A continuous bus lane is proposed along the R835 Lucan Road to the roundabout serving the Lucan Retail Park and also on the N4 Lucan Road eastbound on-slip. A segregated two-way cycle track is proposed on the northern side of this section of the R835 Lucan Road which will require land acquisition from the adjacent green space.

On the N4 Lucan Road it is proposed to maintain the existing continuous eastbound and westbound bus lanes over this section of the route with no change to the number of existing general traffic lanes. In addition, the bus lane on the westbound service road Junction 3 will be extended to ensure bus priority is provided on the approach to the junction with R136 Ballyowen Road at the top of the slip road. A small area of land acquisition will be required from the site of the former Foxhunter public house to facilitate this extended bus lane.

The proposed design provides a significant improvement to the bus stop provision in the vicinity of the Liffey Valley Shopping Centre (LVSC). The bus stops themselves will be moved some 150m further west, increased in length and bus laybys are proposed, segregated from the adjacent N4 Lucan Road carriageway. A small strip of land acquisition is required on the southern side of the N4 adjacent to the car park of the Liffey Valley Office Campus to facilitate the new westbound bus stop arrangement. A retaining wall is proposed for the new boundary at this location.

To better serve the increased bus stop capacity a new pedestrian only bridge is proposed adjacent to the new bus stop locations, some 200m further west from the existing foot / cycle bridge, which will be retained. The position of this new bridge aligns with the new public transport interchange within the LVSC site which is under construction. A small piece of land acquisition is required from the green area adjacent to the shopping centre for the provision of the ramps leading to the new footbridge. Additionally, the speed limit for the bus lanes between N4 junction 2 and the M50 will be reduced from 60km/hr to 50km/hr in the vicinity of the new bus stops.

Between N4 Junction 2 and the M50 on the eastbound approach a change to the lane designation is proposed to separate earlier the general traffic heading towards the M50 northbound and the R148 Palmerstown bypass and provide a continuous bus lane. A new portal gantry is proposed to provide additional lane destination signage. The relocation of the bus stops for LVSC will allow for an increased length for the buses to accelerate and weave with eastbound traffic approaching the M50 interchange, and also an increased weaving length for all westbound traffic exiting the M50 interchange. On the M50 interchange itself it is proposed to provide two general traffic lanes and a continuous bus lane in both directions through the junction.

To provide a continuous facility for the Primary Cycle Route 6 as identified in the GDA Cycle Network Plan, from the roundabout serving the Lucan Retail Park, facilities for cyclists will initially comprise a Quiet Street along the public road providing access to the Hermitage Golf Club.

On the northern side of the N4 between the entrance to the Hermitage Golf Club and Junction 2 of the N4 a segregated two-way cycle track is included in the Proposed Scheme. Land acquisition will be required from the Hermitage Golf Club to provide this cycle track which will connect with the existing foot / cycle bridge over the N4 adjacent to the Mount Andrew estate / St Loman's Hospital access. A piled retaining wall is proposed for the new boundary and 15m high sports netting is proposed adjacent to the relocated boundary for a 130m length opposite Ballyowen Lane, as well as infill planting to the roadside boundary and southern edge of the fairway. Eastwards of this location the two-way cycle track continues on the north side of the N4 and will require land acquisition from the Hermitage Medical Clinic. A retaining wall is proposed for the new boundary. The two-way cycle track will then run along the north side of the eastbound off-slip at Junction 2.

From Junction 2 of the N4 the segregated two-way cycle track will be located along the south side of the Old Lucan Road before connecting to the foot / cycle bridge that crosses the M50. The cycle track will be accommodated within the existing road space on the Old Lucan Road, with the lanes for general traffic being narrowed, and traffic calmed to reflect a proposed 30km/hr speed limit.

On the south side of the N4 a pedestrian priority zone is provided between Ballyowen Lane and the existing foot / cycle bridge over the N4 adjacent to the Mount Andrew estate. From Ballyowen Lane a Quiet Street is proposed along Hermitage Road to the R136 Ballyowen Road. The provision of the two-way segregated cycle track along the northern side of the N4 and the Quiet Street along Hermitage Road avoids the need for a segregated one-way cycle track on the southern side of the N4, as well as along the westbound service road and off-slip at Junction 3.

2.2 M50 Junction 7 to R148 Con Colbert Road – R148 Palmerstown Bypass and Chapelizod Bypass

On this section between M50 Junction 7 and R148 Con Colbert Road – R148 Palmerstown bypass Chapelizod bypass junctions, as described below, it is proposed to upgrade the following junctions to provide bus priority and enhanced pedestrian and cyclist facilities:

- R148 Palmerstown bypass / Kennelsfort Road;
- Old Lucan Road / Kennelsfort Road Lower; and
- R148 Palmerstown bypass / The Oval.

Between the M50 junction and Kennelsfort Road junction, it is proposed to provide a continuous bus lane and two general traffic lanes in the eastbound direction. In the westbound direction, a bus lane and two general traffic lanes are proposed, with the lane designation amended to separate earlier the general traffic heading toward the M50 and the N4 Lucan Road westbound. This arrangement will allow for a continuous westbound bus lane from the Kennelsfort Road junction and through the M50 interchange.

On the R148 Palmerston bypass modifications are proposed to both the Kennelsfort Road and the Old Lucan Road / The Oval junctions to remove the existing left turn slip lanes. In addition, the left turn movement from Kennelsfort Road Lower to the R148 Palmerstown bypass eastbound is to be prohibited to facilitate new signalised crossings on the east side of the Kennelsfort Road junction to serve the enhanced bus stops, the pedestrian demand and to cater for the proposed two-way cycle track that crosses the R148 Palmerstown bypass at this location. Traffic in Palmerstown village wishing to travel east on the R148 towards the city centre will be able to do so by travelling east along the Old Lucan Road to the junction with the Oval.

In addition, at the signalised junction of the R148 with the Old Lucan Road / The Oval a new westbound, bus only, right turn lane is proposed on the R148 Palmerstown bypass to facilitate new bus services through Palmerstown village. A small area of land acquisition will be required from the western edge of the petrol filling station at this location to accommodate this new bus movement. The existing R148 westbound u-turn facility located some 40m east of the junction with the Oval will be closed.

The existing bus stops on the R148 Palmerstown bypass at Kennelsfort Road and The Oval are to be lengthened and relocated to allow the provision of a bus layby in all cases. In addition, it is proposed to rationalise the bus stops within Palmerstown village with new bus stops provided on the Old Lucan Road immediately west of the junction with Mill Lane.

Between the junction with The Oval and the R833 Con Colbert Road junction, it is proposed to maintain a continuous bus lane and two general traffic lanes in each direction, as per the existing arrangement. The existing bus lane and public transport signals on the westbound on-slip from the R112 Kylemore Road will be retained. New bus stops with laybys are proposed where the R148 Chapelizod bypass crosses Chapelizod Hill Road. These will be connected to Chapelizod Hill Road via a combination of steps and ramps. The existing bridge carrying the R148 Chapelizod Bypass over Chapelizod Hill Road will be widened to accommodate the eastbound bus layby and retaining walls are proposed to support the road widening, steps and ramps. Additionally, the speed limit for the bus lanes along the full length of the R148 Chapelizod bypass will be reduced from 80km/hr to 60km/hr.

A segregated two-way cycle track is proposed to run along the north side of the Old Lucan Road from the foot / cycle bridge crossing the M50, all the way through Palmerstown village connecting to the existing pedestrian priority zone at the start of the R148 Chapelizod bypass. A new Toucan crossing is also proposed on the R112 Lucan Road on the approach to Chapelizod village. The cycle track will be accommodated within the existing road space on the Old Lucan Road, with the lanes for general traffic being narrowed and traffic calmed to reflect the existing 30km/hr speed limit. Informal parking will be removed at certain locations along the northern side of the Old Lucan Road between the M50 and Kennelsfort Road Lower where the two-way cycle track is provided.

Along the Old Lucan Road between Kennelsfort Road Lower and the Oval, the existing pay and display parking on the northern side of the road will be removed to accommodate the two-way cycle track. To offset this loss of parking spaces, the existing parallel pay and display parking spaces on the southern side of Old Lucan Road will be replaced with a higher number of perpendicular parking spaces.

In addition, a new segregated two-way cycle track is proposed along the east side of Kennelsfort Road Lower resulting in the loss of a small number of pay and display parking spaces and resulting in the need for a small area of land acquisition from the frontage of the numbers 20 and 22 (the Palmerstown Lodge hotel). The proposed two-way cycle track crosses the R148 Palmerstown bypass via the new signalised cycle crossing on the east side of the junction described above and ends at a new Toucan Crossing on Kennelsfort Road Upper to provide a connection to the existing cycle lanes.

2.3 R148 Con Colbert Road to City Centre – St. John's Road West

On this section between R148 Con Colbert Road – Chapelizod bypass and Frank Sherwin Bridge – St. John's Road West junctions, as described below, it is proposed to upgrade the following junctions to provide bus priority and enhanced pedestrian and cyclist facilities:

- R148 Chapelizod bypass / R148 Con Colbert Road
- R148 Con Colbert Road / R839 Memorial Road;
- R148 Con Colbert Road / R111 South Circular Road;
- R148 St. John's Road West / R111 South Circular Road;
- R148 St. John's Road West / Heuston South Quarter;
- R148 St. John's Road West / Military Road;
- R148 St. John's Road West / Heuston Station; and
- R148 St. John's Road West / Victoria Quay (Frank Sherwin Bridge).

At the R833 Con Colbert Road junction with the R148 Chapelizod bypass the existing left turn slip lane from R833 Con Colbert Road is removed and a segregated cycle track is proposed in each direction. Between the R833 Con Colbert Road junction and the R111 South Circular Road junction the existing continuous bus lanes and two general traffic lanes are maintained and narrowed slightly to facilitate the introduction of a segregated cycle track in each direction.

At the junction between the R148 Con Colbert Road and Memorial Road, the pedestrian crossing will be moved to the east side of the junction to be on the same side of the junction as the bus stops. In addition, while the

junction has been designed to tie-in to the existing one-way layout of Memorial Road, consideration has been given to the tie-in with the proposals contained in the Liffey Valley to City Centre Core Bus Corridor, which proposes making Memorial Road two-way. To facilitate this a new eastbound right-turning lane on the R148 Con Colbert Road could be accommodated within the proposed junction layout.

At the R111 South Circular Road junction, there are a number of changes to existing traffic lanes. On the eastbound and westbound approaches to the junction the existing left turn slip lanes will be removed. On the R111 South Circular Road northbound a short right turn lane is provided to facilitate future bus movements and compensate for restricted turns included in the Liffey Valley to City Centre Core Bus Corridor Scheme. In order to improve the standard of pedestrian and cyclist facilities at this junction, the number of general traffic lanes through the junction will be reduced in the eastbound, northbound and southbound directions and the R111 South Circular Road will be widened along the western edge through the junction to facilitate the inclusion of segregated cycle tracks in each direction.

At the R148 St John's Road West / HSQ junction and the R148 St John's Road West / Military Road junction, existing left-turn slip lanes are removed and improved pedestrian and cyclist facilities will be provided, including Toucan crossings of the R148.

On the R148 St John's Road West between the R111 South Circular Road junction and Heuston Station the existing eastbound lane configuration of one bus lane and one single general traffic lane is proposed to be maintained.

In the westbound direction of R148 St John's Road West a continuous bus lane is to be provided instead of one of the two existing general traffic lanes. A segregated cycle track is proposed in each direction along this section. The existing taxi queuing lane on the eastbound direction will be maintained between the Heuston South Quarter junction and Heuston Station, along with the existing taxi rank at the station.

Along the section of the R148 St John's Road West between the Heuston South Quarter junction and Heuston Station some trees will need to be removed and replaced so that the facilities for both taxis and cycles described above can be provided. An urban realm landscaping improvement is therefore proposed along this section of the road. This includes the removal of the pedestrian guard railing and new planting, which will result in a net increase in the number of trees along the road.

In the immediate vicinity of Heuston Station continuous bus lanes and segregated cycle tracks are provided in both directions as far as Frank Sherwin Bridge, which the Proposed Scheme will tie into the existing arrangement at the Victoria Quay junction. It is proposed to upgrade the bus stop provision on R148 St John's Road West outside the southern façade of the station, with lengthened bus stops and bus laybys provided in both directions. On the southern side of the road this will require some land acquisition from the Health Service Executive's Dr Steevens' Hospital. The extents of this land acquisition have been minimised by the removal of the central kerbed median between the two signalised crossings of the R148 St John's Road West, which will be upgraded to raised Toucan crossings. A detailed urban realm and landscaping proposal has been developed at this location.

A speed limit of 30km/hr is proposed on the R148 St John's Road West between the junction with Military Road and the end of the Proposed Scheme at the junction with Frank Sherwin bridge. This is in recognition of the high amount of pedestrian activity associated with the public transport interchange at Heuston station. While no changes are proposed to the signalised crossing of the Luas Red Line or the platforms for the Luas stop, a minor reduction in height is proposed to the southern end of the rear wall of the eastern Luas platform to provided clearance to the proposed inbound cycle track.

3. Legislative, Planning and Development Context

3.1 Introduction

This Section sets out the prevailing legislation, strategic planning and transport policy context relating to the Proposed Scheme addressing the following tiers:

- Legislative Context;
- International Policy;
- European Union Law & Policy Context;
- National Policy Context;
- Regional Plans / Policy Context; and
- Local Plans / Policy Context.

3.2 Legislative Context

3.2.1 The Roads Act

The Proposed Scheme is 'proposed road development' under the definitions provided by Section 2 of Roads Act, 1993 (as amended) (hereafter referred to as the Roads Act).

The application for approval of the Proposed Scheme is being made under Section 51 of the Roads Act.

3.2.2 Requirement for Environmental Impact Assessment under the Roads Acts

The Roads Act defines 'proposed road development' *as:*

> *'any proposed road development which is subject to an environmental impact assessment under Section 50...'*

Section 50 of the Roads Act 1993 is concerned with environmental impact assessment (EIA) for 'road development'. Section 50(1)(a) provides as follows:

> *'(1)(a) A road development that is proposed that comprises any of the following shall be subject to an environmental impact assessment:*
>
> *(i) the construction of a motorway;*
>
> *(ii) the construction of a busway;*
>
> *(iii) the construction of a service area;*
>
> *(iv) any prescribed type of road development consisting of the construction of a proposed public road or the improvement of an existing public road.'*

Under Article 8 of S.I. No. 119 of 1994 - Road Regulations, 1994 (as amended) (hereafter referred to as the Roads Regulations), the prescribed type of road development for the purposes of section 50(1)(a)(iv) of the Roads Act are:

> *'(a) the construction of a new road of four or more lanes, or the realignment or widening of an existing road so as to provide four or more lanes, where such new, realigned or widened road would be eight kilometres or more in length in a rural area, or 500 metres or more in length in an urban area;*
>
> *(b) the construction of a new bridge or tunnel which would be 100 metres or more in length.'*

The Proposed Scheme does not fall under the list of projects identified in Annex I of the EIA Directive. Moreover, the Proposed Scheme does not meet or exceed the thresholds under Section 50 of the Roads Act and/or Article 8 of the Roads Regulations 1994, such that it would automatically trigger the requirement for an EIA.

An EIA Screening Report was prepared, the purpose of which, in accordance with Section 50(1)(c) of the Roads Act, was to consider whether the Proposed Scheme would be likely to have significant effects on the environment. It is considered that the Proposed Scheme is likely to have significant effects on the environment and, as such, requires an EIA to be carried out prior to a decision being made to grant development consent. This is reflected in an EIA Screening Determination made by the BusConnects Programme Board of the NTA on 09 August 2021.

3.3 International Policy

3.3.1 United Nations 2030 Agenda

In September 2015, Transforming Our World, the 2030 Agenda for Sustainable Development (the 2030 Agenda) was adopted by all 193 Members States of the United Nations (UN). The 2030 Agenda aims to deliver a more sustainable, prosperous, and peaceful future for the entire world, and sets out a framework for how to achieve this by 2030. This framework is made up of 17 Sustainable Development Goals (SDGs) which cover the social, economic, and environmental requirements for a sustainable future which are shown in Image 2.1.

Image 2.1 The 17 Sustainable Development Goals (Source: United Nations)

The SDGs are integrated, they recognize that action in one area will affect outcomes in others, and that development must balance social, economic and environmental sustainability.

Sustainable Development Goals 9 and 11 are relevant to the Proposed Scheme:

Goal 9: Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation	
Target 9.1	Develop quality, reliable, sustainable, and resilient infrastructure, including regional and trans-border infrastructure, to support economic development and human wellbeing, with a focus on affordable and equitable access for all.
Goal 11: Make cities and human settlements inclusive, safe, resilient, and sustainable	
Target 11.2	By 2030, provide access to safe, affordable, accessible, and sustainable transport systems for all, improving road safety, notably by expanding public transport, with special attention to the needs of those in vulnerable situations, women, children, persons with disabilities and older persons.

3.3.1.1 Proposed Scheme Response

The Proposed Scheme is supported by the goals and targets set out in the relevant SDGs. It will provide for enhanced walking, cycling and bus infrastructure, which will subsequently enable more efficient, safe and integrated sustainable transport movement along this corridor.

In Ireland, the SDGs are being implemented through the National Implementation Plan 2018-2020 (DCCAE 2018), which is in direct response to the 2030 Agenda. It provides a whole-of-government approach to implement the 17 SDGs – see brief description later in the National Policy section.

3.4 European Union Law & Policy

3.4.1 Sustainable and Smart Mobility Strategy 2020

The Sustainable and Smart Mobility Strategy (European Commission 2020) sets out a number of goals as to how people will move within and between cities in the future. It has identified 82 initiatives which have been categorised into 10 'flagships.'

The flagship relevant to the Proposed Scheme is '*Flagship 3 – Making interurban and urban mobility more sustainable and healthy*'. It states that:

> *'increasing the modal shares of collective transport, walking and cycling, as well as automated, connected and multimodal mobility will significantly lower pollution and congestion from transport, especially in cities and improve the health and well-being of people. Cities are and should therefore remain at the forefront of the transition towards greater sustainability.'*

A target of the strategy relevant to the Proposed Scheme is to double cycling infrastructure in cities within the European Union to 5,000km in the next decade.

3.4.1.1 Proposed Scheme Response

The Proposed Scheme supports the objectives of the EU's Sustainable and Smart Mobility Strategy through significant investment in cycle and pedestrian infrastructure, in addition to bus priority, along the route of the Proposed Scheme, thereby supporting and encouraging growth in active travel and sustainable public transport usage.

3.4.2 European Green Deal 2019

The European Green Deal (EGD) (European Commission 2019) sets out ambitious policies aimed at cutting emissions and preserving the natural environment. Pursuant to Regulation (EU) 2021/1119 of the European Parliament and of the Council of 30 June 2021, establishing the framework for achieving climate neutrality and amending Regulations (EC) No 401/2009 and (EU) 2018/1999, the binding EU 2030 climate target shall be a domestic reduction of net greenhouse gas emissions (emissions after deduction of removals) by at least 55% by 2030, compared to 1990 levels. In addition to binding legislation and other initiatives adopted at EU level, all

sectors of the economy – including transport – must play a role in contributing to the achievement of climate neutrality within the European Union by 2050.

As indicated in the European Green Deal, on 9 December 2020, the European Commission adopted a communication entitled 'Sustainable and Smart Mobility Strategy – Putting European Transport on Track for the Future'. The strategy sets out a roadmap for a sustainable and smart future for European transport, with an action plan towards an objective to deliver a 90% reduction in emissions from the transport sector by 2050.

This Strategy has the objective of '*accelerating the shift to sustainable and smart mobility'* and requires that*, '[t]he EU transport system and infrastructure will be made fit to support new sustainable mobility services that can reduce congestion and pollution, especially in urban areas'*. It is noted that pollution is concentrated the most in cities and that a combination of measures is needed which includes '*improving public transport and promoting active modes of transport such as walking and cycling.'*

3.4.2.1 Proposed Scheme Response

The Proposed Scheme is necessary, in conjunction with a range of other initiatives, to attain the objectives of the European Green Deal, through significant investment in cycle and pedestrian infrastructure, in addition to bus priority, thereby supporting and encouraging growth in active travel and sustainable public transport usage.

3.5 National Policy

The following Section includes those National plans, policies, and strategies relevant to the Proposed Scheme.

3.5.1 Project Ireland 2040 – National Planning Framework (NPF)

Project Ireland 2040 National Planning Framework (hereafter referred to as the NPF) (Government of Ireland 2018b) is the Government's strategic framework to guide development and investment. The NPF's ambition is to create a single vision and a shared set of goals for each community to shape the growth and development of Ireland by providing a framework up to the year 2040. These goals are expressed as National Strategic Outcomes (NSOs), shared benefits which the NPF will deliver if implemented according to the objectives of the NPF. The NPF NSOs relevant to the Proposed Scheme are set out in Table 3.1 with a corresponding statement on how the Proposed Scheme meets each respective NSO objective.

Table 3.1: National Strategic Outcomes (NSO) of the NPF

National Strategic Outcome	How the Proposed Scheme is supported by the NSO Objective
NSO1 Compact Growth *'Carefully managing the sustainable growth of compact cities, towns and villages will add value and create more attractive places in which people can live and work. All our urban settlements contain many potential development areas, centrally located and frequently publicly owned, that are suitable and capable of re-use to provide housing, jobs, amenities and services, but which need a streamlined and co-ordinated approach to their development, with investment in enabling infrastructure and supporting amenities, to realise their potential. Activating these strategic areas and achieving effective density and consolidation, rather than more sprawl of urban development, is a top priority.'*	The Proposed Scheme will facilitate the sustainable growth of Dublin through delivering transport infrastructure necessary to provide a bus network that works for a growing city. The Proposed Scheme is designed to provide a better, more reliable and more efficient bus service for everyone. The Proposed Scheme will support the creation of an attractive, resilient, equitable public transport network better connecting communities and improving access to work, education and social activity. The Proposed Scheme will bring greater accessibility to the City Centre and better connect communities and locations along its route for people to avail of housing, jobs, amenities and services. The Proposed Scheme will support enhancing the capacity of a sustainable transport network, and as a consequence will help to achieve greater land use densities that will encourage compact growth in compliance with the objectives of NSO1.

National Strategic Outcome	How the Proposed Scheme is supported by the NSO Objective
NSO2 Enhanced Regional Accessibility *'A co-priority is to enhance accessibility between key urban centres of population and their regions. This means ensuring that all regions and urban areas in the country have a high degree of accessibility to Dublin, as well as to each other. Not every route has to look east and so accessibility and connectivity between places like Cork and Limerick, to give one example, and through the Atlantic Economic Corridor to Galway as well as access to the North-West is essential.'*	NSO2 recognises the importance of accessibility to Dublin for all regions and urban areas in Ireland. Dublin is clearly a vital artery in Ireland's transport network and the Proposed Scheme, by enhancing links to regional bus, rail and roads infrastructure, meets the objectives of NSO2.
NSO4 Sustainable Mobility *'In line with Ireland's Climate Change mitigation plan, we need to progressively electrify our mobility systems moving away from polluting and carbon intensive propulsion systems to new technologies such as electric vehicles and introduction of electric and hybrid traction systems for public transport fleets, such that by 2040 our cities and towns will enjoy a cleaner, quieter environment free of combustion engine driven transport systems.'*	The Proposed Scheme will provide infrastructure to support a sustainable transport network that will facilitate a modal shift from private car usage to sustainable transport. It will reduce journey times and increase journey time reliability and increase the attractiveness of active travel and public transport for travel, which will in turn facilitate sustainable transport option alternatives to private car usage. The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services who will use the corridor.
NSO5 A Strong Economy supported by Enterprise, Innovation and Skills *'This will depend on creating places that can foster enterprise and innovation and attract investment and talent. It can be achieved by building regional economic drivers and by supporting opportunities to diversify and strengthen the rural economy, to leverage the potential of places. Delivering this outcome will require the coordination of growth and place making with investment in world class infrastructure, including digital connectivity, and in skills and talent to support economic competiveness* [sic]*and enterprise growth.'*	The Proposed Scheme is a high-quality development that will provide the infrastructure required to facilitate sustainable transport options which will service the transport needs of Dublin. Accessibility to jobs and education that underpin the economy is of fundamental importance. The Proposed Scheme will bring enhanced access to housing, employment opportunities, education and social / amenity services for the communities along the route of the Proposed Scheme through supporting improved transport services.
NSO6 High-Quality International Connectivity *'This is crucial for overall international competitiveness and addressing opportunities and challenges from Brexit through investment in our ports and airports in line with sectoral priorities already defined through National Ports Policy and National Aviation Policy and signature projects such as the second runway for Dublin Airport and the Port of Cork - Ringaskiddy Redevelopment.'*	The Proposed Scheme will provide the infrastructure required to facilitate enhanced sustainable transport into Dublin City Centre allowing greater accessibility to onward access to key international points of entry to Ireland in compliance with the objectives of NSO6.
NSO7 Enhanced Amenity and Heritage *'This will ensure that our cities, towns and villages are attractive and can offer a good quality of life. It will require investment in well-designed public realm, which includes public spaces, parks and streets, as well as recreational infrastructure. It also includes amenities in rural areas, such as national and forest parks, activity-based tourism and trails such as greenways, blueways and peatways. This is linked to and must integrate with our built, cultural and natural heritage, which has intrinsic value in defining the character of urban and rural areas and adding to their attractiveness and sense of place.'*	The overall landscape and urban realm design strategy for the Proposed Scheme aims to create attractive, consistent, functional and accessible places for people alongside the core bus and cycle facilities. It aims to mitigate any adverse effects that the proposals may have on the streets, spaces, local areas and landscape through the use of appropriate design responses. In addition, opportunities have been sought to enhance the public realm and landscape design where possible. Furthermore, built and natural heritage have been key considerations in the design of the Proposed Scheme in compliance with the objectives of NSO7.
NSO8 Transition to a Low Carbon and Climate Resilient Society	The Proposed Scheme comprises transport infrastructure that supports the delivery of an efficient, low carbon and climate

National Strategic Outcome	How the Proposed Scheme is supported by the NSO Objective
'The National Climate Policy Position establishes the national objective of achieving transition to a competitive, low carbon, climate-resilient and environmentally sustainable economy by 2050. This objective will shape investment choices over the coming decades in line with the National Mitigation Plan and the National Adaptation Framework. New energy systems and transmission grids will be necessary for a more distributed, renewables-focused energy generation system, harnessing both the considerable on-shore and off-shore potential from energy sources such as wind, wave and solar and connecting the richest sources of that energy to the major sources of demand.'	resilient public transport service. The primary objective of the Proposed Scheme therefore, through the provision of necessary bus, cycle, and walking infrastructure enhancements, is the facilitation of modal shift from car dependency, and thereby contributing to an efficient, integrated transport system and a low carbon and climate resilient City in compliance with NSO8 The Proposed Scheme will provide the advantage of segregated cycling facilities. These high-quality cycle tracks will be typically 2m in width offering a high level of service and help to reduce dependency on private car use for short journeys in compliance with the objectives of NSO8. Furthermore, all drainage structures for newly paved areas are designed with a minimum return period of no flooding in 1:30 years with a 20% climate change allowance.
NSO9 Sustainable Management of Water, Waste and other Environmental Resources *'Ireland has abundant natural and environmental resources such as our water sources that are critical to our environmental and economic wellbeing into the future. Conserving and enhancing the quality of these resources will also become more important in a crowded and competitive world as well as our capacity to create beneficial uses from products previously considered as waste, creating circular economic benefits.'*	The Proposed Scheme has been designed to minimise the amount and extent of major construction works required, and therefore minimise the quantities of construction materials required. The Proposed Scheme has taken into consideration the objectives of a circular economy and aims to re-use materials, where possible. Consideration has been given to the sustainability of material being sourced for the construction of the Proposed Scheme. Insofar as is reasonably practicable, materials required for the construction of the Proposed Scheme will be sourced locally in order to reduce the amount of travelling required to transfer the material to the site. Construction materials will be managed on-site in such a way as to prevent over-ordering and waste. A Construction and Demolition Resource and Waste Management Plan (CDRWMP) has been developed and will be implemented (and updated as necessary) by the appointed contractor. In regard to water during the construction phase, the EIAR includes details on guidance documents and control measures for site clearance, construction compound, silty water runoff, storage of materials, working in-stream or in close proximity to watercourses, fuel storage, use of concrete and monitoring. Mitigation for the operational phase has been built into the design of the Proposed Scheme. The Proposed Scheme is compliant with the objectives of NSO9.
NSO10 Access to Quality Childcare, Education and Health Services *'Good access to a range of quality education and health services, relative to the scale of a region, city, town, neighbourhood or community is a defining characteristic of attractive, successful and competitive places. Compact, smart growth in urban areas and strong and stable rural communities will enable the enhanced and effective provision of a range of accessible services.'*	The Proposed Scheme provides infrastructure to support the delivery of sustainable transport that will benefit the entire community in terms of greater accessibility, capacity and speed of service improvements. The infrastructure improvements are along key arterial routes which include many of Dublin's childcare, educational and health care services in compliance with the objectives of NSO10.

Specifically, in regard to the Dublin City and Metropolitan Area, the NPF states that:

> '*Dublin needs to accommodate a greater proportion of the growth it generates within its metropolitan boundaries and to offer improved housing choice, transport mobility and quality of life.'* It further outlines that *'Dublin's continued performance is critical to Ireland's competitiveness. Improving the strategic infrastructure required to sustain growth will be a key priority as part of the Metropolitan Area Strategic Plan (MASP), and will include enhanced airport and port access and capacity, expansion and improvement of the bus, DART and Luas/Metro networks*…'

Under the heading '*Key future growth enablers for Dublin include*' it highlights:

> '*The development of an improved bus-based system, with better orbital connectivity and integration with other transport networks'* and *'Delivery of the metropolitan cycle network set out in the Greater Dublin Area Cycle Network Plan inclusive of key commuter routes and urban greenways on the canal, river and coastal corridors*.'

3.5.1.1 Proposed Scheme Response

The Proposed Scheme supports the goals of the NPF by delivering infrastructure that will facilitate high-quality sustainable active travel and public transport networks. In doing so, the Proposed Scheme will facilitate an accelerated shift and the urgent transition needed to deliver a low carbon and climate resilient society. The Proposed Scheme also includes localised public realm improvements that will ensure a more attractive, liveable urban place for the local community living adjacent to the Proposed Scheme.

The Proposed Scheme supports the outcome of the NPF related to Compact Growth. The NPF describes how the careful management and sustained growth of compact cities, towns and villages will add value and create more attractive places in which people can live and work. A key NPF priority involves achieving effective density and consolidation, rather than more sprawl of urban development. One of the overall objectives of BusConnects is to enhance compact growth, regeneration opportunities and more effective use of land in Dublin, for present and future generation through the provision of safe and efficient sustainable transport networks. The Proposed Scheme supports this objective.

3.5.2 National Development Plan 2021 – 2030

Project Ireland 2040 is the government's long-term overarching strategy to make Ireland a better country for all its people. The National Development Plan (hereafter referred to as the NDP) (Government of Ireland 2021a) and the National Planning Framework (hereafter referred to as the NPF) (Government of Ireland 2018b) combine to form Project Ireland 2040. The NDP 2018 – 2027 and the NPF were adopted in May 2018. The review of the NDP was originally planned for 2022 but this was brought forward in an effort to stimulate the economy and bring about an 'Infrastructure-led recovery' and 'green recovery' in the wake of Covid-19. The revised NDP 2021-2030 was adopted in October 2021.

The NDP is the National capital investment strategy plan. It sets out the framework of expenditure commitments to secure the Strategic Investment Priorities to the year 2030 and support the delivery of the 10 National Strategic Outcomes (NSO's) identified in the NPF and described in Section 3.5.1 as applicable to the Proposed Scheme. The NDP under Section 4.1 (National Strategic Outcomes) sets out '*This National Development Plan will incorporate a total public investment of €165 billion over the period 2021-2030*.'

Under the heading 'Major Investments' the NDP sets out that '*This NDP will be the largest and greenest ever delivered in Ireland, with a particular focus on supporting the largest public housing programme in the history of the state. While many of the investments in this NDP are already well known and have been progressing through planning for some time (e.g. BusConnects), there are a range of investments which are new or enhanced in the NDP. A selection of these are listed below*.' This includes under NSO 4 'Sustainable Mobility' '*BusConnects for Ireland's Cities*'.

In Section 3.9 'Catalysing the shift towards accessibility-based mobility systems' it comments that '*The greenhouse gas emissions associated with public transport will be addresses by replacing diesel buses with lower emitting alternatives under the BusConnects programme.*'

Figure 5.4 'Selection of Major Regional Investments Planned in the National Development Plan' includes in the section entitled 'Selection of investments for the Eastern and Midland Region'. Inter alia: BusConnects.

The NDP sets out a programme of investment that includes indicative Exchequer allocations. BusConnects is specifically identified as one of the five 'Strategic Investment Priorities' that aligns with NSO4 (Sustainable Mobility) of the NPF. The NDP outlines under the heading 'Sustainable Mobility' that; '*The National Planning Framework (NPF) recognises the importance of significant investment in sustainable mobility (active travel and public transport)' networks if the NPF population growth targets are to be achieved. Investing in high quality sustainable mobility will improve citizens' quality of life, support our transition to a low-carbon society and enhance our economic competitiveness*.'

It continues:

> *'Improved and expanded sustainable mobility services and infrastructure can also act as an enabler of the NPF's commitment toward the compact growth of the cities, towns and villages within their existing urban footprint.'*

It further states:

> *'….transport led development will become an increasingly important area of investment focus for the sustainable mobility programme over the period of the NDP.'*

It also highlights that:

> *'The NDP provides for significant investment in active travel, bus and rail infrastructure over the next ten years in terms of expanding sustainable mobility options in our cities, towns and villages.'* It continues *'In the previous NDP, the Transport sector had an allocation of approximately €21 billion for the period 2018-2027. The revised NDP sets out further ambitious plans to enhance public transport, active travel options and the connectivity of communities throughout Ireland. Transport projects by their nature are delivered over a multi-year horizon. The scale of the Transport-related requirements under the revised NDP amounts to c. €35 billion in total over 2021-2030.'*

Under the heading 'Sectoral Strategies' it makes reference to the Climate Action Plan (CAP) and recognises *'..that Ireland must achieve a significant modal shift from car to active travel and public transport if we are to achieve our target of a 51% reduction in Green House Gas emissions by 2030 and ultimately net zero by 2050*.'

In regard to 'Active Travel', the NDP comments:

> *'This NDP represents a step-change in the approach towards funding active travel in Ireland. Over the next 10 years approximately €360 million per annum will be invested in walking and cycling infrastructure in cities, town and villages across the country, including Greenways.' It continues 'The investment proposed for the major urban centres over the next 5 years will target over 700km of improved walking and cycling infrastructure delivered across the five cities.'*

Specifically in regard to BusConnects, the NDP outlines the following:

> '*Transformed active travel and bus infrastructure and services in all five of Ireland's major cities is fundamental to achieving the overarching target of 500,000 additional active travel and public transport journeys by 2030*.'

It also sets out that:

'BusConnects will overhaul the current bus system in all five cities by implementing a network of 'next generation' bus corridors (including segregated cycling facilities) on the busiest routes to make journeys faster, predictable and reliable. BusConnects will enhance the capacity and potential of the public transport system by increasing and replacing the bus fleets with low emission vehicles and introducing a new system of ticketing known as Next Generation Ticketing and cashless payments. Increasing the attractiveness of the bus systems in the cities will encourage modal shift away from private car use, leading to a reduction in congestion and associated costs in the major urban areas. Over the lifetime of this NDP, there will be significant progress made on delivering BusConnects with the construction of Core Bus Corridors expected to be substantially complete in all five cities by 2030.'

3.5.2.1 Revised National Development Plan

It is noted that the explanatory text under each National Strategic Outcome (NSO) within the NPF has not been fully replicated within the revised NDP. The table below sets out some changes in the explanatory wording of each applicable NSO between the NPF and the revised NDP.

Table 3.2: NSO Objective Differences NPF and NDP

NPF National Strategic Outcome (NSO)	Revised NDP NSO explanatory text	Consideration of explanatory text changes between NPF and revised NDP
NSO1 Compact Growth *'Carefully managing the sustainable growth of compact cities, towns and villages will add value and create more attractive places in which people can live and work. All our urban settlements contain many potential development areas, centrally located and frequently publicly owned, that are suitable and capable of re-use to provide housing, jobs, amenities and services, but which need a streamlined and co-ordinated approach to their development, with investment in enabling infrastructure and supporting amenities, to realise their potential. Activating these strategic areas and achieving effective density and consolidation, rather than more sprawl of urban development, is a top priority.'*	**NSO1 Compact Growth** *'Carefully managing the sustainable growth of compact cities, towns and villages will add value and create more attractive places in which people can live and work. All our urban settlements contain many potential development areas, centrally located and frequently publicly owned, that are suitable and capable of being developed to provide housing, jobs, amenities and community services, but which need a streamlined and co-ordinated approach to their development, with investment in enabling infrastructure and supporting amenities, to realise their potential. Activating these strategic areas and achieving effective density and consolidation, rather than more sprawl of urban development, is a top priority.'*	The explanatory text in the revised NDP mostly mirrors that within the NPF. The only change is the insertion of the word '*community*' when it refers to services that have the potential to be developed within urban settlement '*potential development areas'*.
NSO2 Enhanced Regional Accessibility *'A co-priority is to enhance accessibility between key urban centres of population and their regions. This means ensuring that all regions and urban areas in the country have a high degree of accessibility to Dublin, as well as to each other. Not every route has to look east and so accessibility and connectivity between places like Cork and Limerick, to give one example, and through the Atlantic Economic Corridor to Galway as well as access to the North-West is essential.'*	**NSO2 Enhanced Regional Accessibility** The revised NDP does not fully replicate the explanatory text as set out under the NPF. However, it does comment (inter alia), as follows: *'This National Strategic Outcome seeks to enhance intra-regional accessibility through improving transport links between key urban centres of population and their respective regions, as well as improving transport links between the regions themselves.'*	The revised NDP maintains the objectives of NPF NSO2 and emphasizes improving transport links as a means to enhancing intra-regional accessibility.

NPF National Strategic Outcome (NSO)	Revised NDP NSO explanatory text	Consideration of explanatory text changes between NPF and revised NDP
NSO4 Sustainable Mobility *'In line with Ireland's Climate Change mitigation plan, we need to progressively electrify our mobility systems moving away from polluting and carbon intensive propulsion systems to new technologies such as electric vehicles and introduction of electric and hybrid traction systems for public transport fleets, such that by 2040 our cities and towns will enjoy a cleaner, quieter environment free of combustion engine driven transport systems.'*	**NSO4: Sustainable Mobility** The revised NDP does not fully replicate the explanatory text as set out under the NPF. However, it does comment (inter alia), as follows*: 'The National Planning Framework (NPF) recognizes the importance of significant investment in sustainable mobility (active travel and public transport) networks if the NPF population growth targets are to be achieved. Investing in high-quality sustainable mobility will improve citizens' quality of life, support our transition to a low-carbon society and enhance our economic competitiveness.'*	The revised NDP maintains the objectives of NPF NSO4 and includes added emphasis on active travel and public transport as a means to support Ireland's transition to a '*low-carbon society and enhance our economic competitiveness.'*
NSO5 A Strong Economy supported by Enterprise, Innovation and Skills *'This will depend on creating places that can foster enterprise and innovation and attract investment and talent. It can be achieved by building regional economic drivers and by supporting opportunities to diversify and strengthen the rural economy, to leverage the potential of places. Delivering this outcome will require the coordination of growth and place making with investment in world class infrastructure, including digital connectivity, and in skills and talent to support economic competitiveness and enterprise growth.'*	**NSO5 A Strong Economy supported by Enterprise, Innovation and Skills** The revised NDP does not fully replicate the explanatory text as set out under the NPF. However, it does comment (inter alia), as follows*: 'A competitive, innovative and resilient enterprise base is essential to provide high-quality jobs and employment opportunities for people to live and prosper in all regions. The next decade will see profound changes in our economy and society. While the impacts of Brexit and the Covid-19 pandemic will continue to challenge businesses in the first part of the decade, the digitization of entire sectors and the transition to a low-carbon economy will be even more transformative.'*	The revised NDP maintains the objectives of NPF NSO5 and places added emphasis on providing high quality jobs and employment opportunities. In addition, it acknowledges the impacts of Brexit, Covid-19, digitization and the transition to a '*low carbon economy'.*
NSO6 High-Quality International Connectivity *'This is crucial for overall international competitiveness and addressing opportunities and challenges from Brexit through investment in our ports and airports in line with sectoral priorities already defined through National Ports Policy and National Aviation Policy and signature projects such as the second runway for Dublin Airport and the Port of Cork - Ringaskiddy Redevelopment.'*	**NSO6 High-Quality International Connectivity** The revised NDP does not fully replicate the explanatory text as set out under the NPF. However, it does comment (inter alia), as follows: *'As an island, continued investment in our port and airport connections to the UK, the EU and the rest of the world, is integral to underpinning international competitiveness. It is also central to responding to the challenges as well as the opportunities arising from Brexit.'* It also comments '*Plans for strengthening surface connectivity to ports and airports will continue to be prioritised.*'	The revised NDP maintains the objectives of NPF NSO6 and includes in the explanatory text not only aims to improve international connections via airports and ports but also the need to enhance the '*surface connectivity'* to same.

NPF National Strategic Outcome (NSO)	Revised NDP NSO explanatory text	Consideration of explanatory text changes between NPF and revised NDP
NSO7 Enhanced Amenity and Heritage *'This will ensure that our cities, towns and villages are attractive and can offer a good quality of life. It will require investment in well-designed public realm, which includes public spaces, parks and streets, as well as recreational infrastructure. It also includes amenities in rural areas, such as national and forest parks, activity-based tourism and trails such as greenways, blueways and peatways. This is linked to and must integrate with our built, cultural and natural heritage, which has intrinsic value in defining the character of urban and rural areas and adding to their attractiveness and sense of place.'*	**NSO7 Enhanced Amenity and Heritage** The revised NDP does not fully replicate the explanatory text as set out under the NPF. However, it does comment (inter alia), as follows: *'Investment in our heritage has the dual benefit of protecting our natural and historic built environment while improving health, wellbeing and providing a catalyst for the economy through the development of recreational activities and the expansion of tourism as appropriate within heritage sites. Keeping this national tourism product intact, enhanced, developed and promoted will help secure the long-term viability of sustainable tourism incomes and will need to be a priority going forward.'*	The revised NDP maintains the objectives of NPF NSO7.
NSO8 Transition to a Low Carbon and Climate Resilient Society *'The National Climate Policy Position establishes the national objective of achieving transition to a competitive, low carbon, climate-resilient and environmentally sustainable economy by 2050. This objective will shape investment choices over the coming decades in line with the National Mitigation Plan and the National Adaptation Framework. New energy systems and transmission grids will be necessary for a more distributed, renewables-focused energy generation system, harnessing both the considerable on-shore and off-shore potential from energy sources such as wind, wave and solar and connecting the richest sources of that energy to the major sources of demand.'*	**NSO8 Transition to a Climate-Neutral and Climate-Resilient Society** The revised NDP does not fully replicate the explanatory text as set out under the NPF. However, it does comment (inter alia), as follows: *'The next 10 years are critical if we are to address the climate crisis and ensure a safe and bright future for the planet, and all of us on it. In Ireland we have significantly stepped up our climate ambition. The Climate Action and Low Carbon Development (Amendment) Act 2021 commits us to a 51% reduction in our overall greenhouse gas emissions by 2030, and to achieving net zero emissions no later than by 2050.'* *'The investment priorities included in this chapter must be delivered to meet the targets set out in the current and future Climate Action Plans, and to achieve our climate objectives. The investment priorities represent a decisive shift towards the achievement of a decarbonized society, demonstrating the Government's unequivocal commitment to securing a carbon neutral future.'*	The revised NDP has changed the NPF wording for NSO8 and replaces 'low carbon' with 'climate neutral'. Climate neutral implies removing all greenhouse gases to zero which appears to be a greater government commitment than to aspire to a 'low carbon' society'. The revised NDP refers to the 'climate crisis' and the carbon reduction commitments made within the Climate Action and Low Carbon Development (Amendment) Act 2021. This new legislation places a greater sense of urgency and importance on addressing climate change.
NSO9 Sustainable Management of Water, Waste and other Environmental Resources *'Ireland has abundant natural and environmental resources such as our*	**NSO9 Sustainable Management of Water and Other Environmental Resources** The revised NDP does not fully replicate the explanatory text as set out under the	The revised NDP omits the word 'waste' from NSO9 but otherwise maintains the objectives of NPF NSO9. The need for a circular economy is re-emphasised within the revised NDP.

NPF National Strategic Outcome (NSO)	Revised NDP NSO explanatory text	Consideration of explanatory text changes between NPF and revised NDP
water sources that are critical to our environmental and economic wellbeing into the future. Conserving and enhancing the quality of these resources will also become more important in a crowded and competitive world as well as our capacity to create beneficial uses from products previously considered as waste, creating circular economic benefits.'	NPF. However, it does comment (inter alia), as follows: *'In a Circular Economy, the inherent value of products, materials and our natural resources is maintained for as long as possible. Additionally, the NPF highlights the centrality of our sustainable water resources to the implementation of the NPF to underpin our environmental and economic well-being into the future which is against the backdrop of the significant deficits in water services capacity and quality reflecting historic underinvestment.'*	
NSO10 Access to Quality Childcare, Education and Health Services *'Good access to a range of quality education and health services, relative to the scale of a region, city, town, neighbourhood or community is a defining characteristic of attractive, successful and competitive places. Compact, smart growth in urban areas and strong and stable rural communities will enable the enhanced and effective provision of a range of accessible services.'*	**NSO10 Access to Quality Childcare, Education and Health Services** The revised NDP does not fully replicate the explanatory text as set out under the NPF. However, it does comment (inter alia), as follows: *'Access to quality primary education, health services and childcare, relative to the scale of a region, city, town, neighbourhood or community is a defining characteristic of attractive, successful and competitive places.'*	The revised NDP maintains the objectives of NPF NSO10.

In summary, it is considered that the revised NDP brings up to date the explanatory text associated with the NSOs under the NPF. The enactment of the Climate Action and Low Carbon Development (Amendment) Act 2021 has placed greater emphasis on tackling climate change and utilising government policy as a means to bring about a climate neutral society and economy. The Proposed Project will provide the infrastructure required to deliver sustainable public transport that will assist in the drive towards a carbon / climate neutral future for Ireland.

3.5.2.2 Proposed Scheme Response

The Proposed Scheme forming part of the CBC Infrastructure Works within the overall BusConnects Programme is therefore identified as a component of a 'Strategic Investment Priority', with an associated investment commitment, which has been determined as central to the delivery of the NPF vision. The Proposed Scheme is an integral part of Ireland's policy to reduce emissions by providing the infrastructure necessary to deliver a sustainable transport network. The Proposed Scheme will facilitate continued planned and forecasted population growth in the GDA and along the route of the Proposed Scheme by meeting existing and future travel demand through investment in a sustainable transport network and services. As required in the NDP, the Proposed Scheme will provide the infrastructure needed to help facilitate a modal shift from private car to public transport, cycling and walking. It will also bring to fruition a 'Strategic Investment Priority' of the NDP to help deliver the full '*BusConnects programme'*.

3.5.3 National Investment Framework for Transport in Ireland

The Department of Transport (DoT) has finalised the transport framework, the National Investment Framework for Transport in Ireland (hereafter referred to as NIFTI) (DoT 2021) to ensure alignment with the policies of the NPF. NIFTI sets out the Department of Transport's strategy for the development and management of Ireland's

land transport network (roads, public transport, walking and cycling) over the next two decades. The NPF and its projections around population and settlement patterns are central to the development of NIFTI. The purpose of NIFTI is to enable the delivery of Project Ireland 2040 and the ten National Strategic Objectives (NSOs) by guiding the appropriate investment in Ireland's roads, active travel and public transport infrastructure.

To invest sustainably, NIFTI establishes hierarchies which prioritise environmentally sustainable and proportional solutions to a given transport need or opportunity. In combination, it is intended that these hierarchies will ensure that we tackle the right problems with the right solutions.

NIFTI sets out the types of positive outcomes transport investment can deliver, including:

- Delivering clean, low carbon and environmentally sustainable mobility;
- Supporting Successful Places and Vibrant Communities;
- Facilitating Safe, Accessible, Reliable and Efficient Travel on the Network; and
- Promoting a Strong and Balanced Economy.

NIFTI was published by the DoT on 21 December 2021 and includes investment hierarchies that ensure strategic alignment of future transport investment and to support the NPF. The investment priorities are based on two hierarchies, Modal and Intervention which are set out below:

Modal Hierarchy

NIFTI Modal Hierarchy is:

1. Active Travel;
2. Public Transport; and
3. Private Vehicles.

The plan states that future transport planning will prioritise sustainable modes and

> *'……sets out a hierarchy of travel modes to be accommodated and encouraged when investments and other interventions are made. Sustainable modes, starting with active travel and then public transport, will be encouraged over less sustainable modes such as the private car.*
>
> *Active travel is the most sustainable mode of travel. Increasing the share of active travel can reduce the carbon footprint of the transport sector, improve air quality, reduce urban congestion, and bring about positive health impacts as a result of increased physical activity. The attractiveness of this mode is dependent on infrastructure — for example, dedicated footpaths, segregated cycle lanes and the quality and priority of road crossing points all impact upon the number of people engaging in active travel.'*

Intervention Hierarchy

NIFTI Intervention Hierarchy is:

1. Maintain;
2. Optimise;
3. Improve; and
4. New.

> *'To support the delivery of the NPF, and to make best use of our existing assets, a hierarchy of these intervention types will be applied. Maintaining the existing transport network will be given first priority, followed by maximising the value of the network through optimising its use. Infrastructural investments will only be considered after these two categories have been assessed as inappropriate for the identified problem, with upgrades to existing infrastructure to be considered before new infrastructure.'*

De-carbonising the transport sector is a key priority for reaching Ireland's climate change targets. NIFTI supports sustainable mobility and encourages active travel and public transport. It supports projects that will reduce urban congestion, particularly those that include new sustainable mobility infrastructure and optimises the existing infrastructure to prioritise sustainable transport modes.

3.5.3.1 Proposed Scheme Response

The Proposed Scheme is compliant with NIFTI (DoT 2021) as it will facilitate accessible and reliable public transport. It supports sustainable transport modes including active travel modes. NIFTI recognises that active travel is the most sustainable mode of travel and acknowledges that the attractiveness of this mode is dependent on infrastructure, for example, dedicated footpaths, segregated cycle tracks and the quality and priority of road crossing points all impact upon the number of people engaging in active travel. The Proposed Scheme will provide improved infrastructure for active travel modes.

3.5.4 Department of Transport: Statement of Strategy 2021 – 2023

The Statement of Strategy sets out goals and strategic approach which are designed to support continuing economic recovery, fiscal consolidation, job creation and social development. It notes that '*Aligned with the National Planning Framework and the National Economic Plan we will maintain and develop high quality sustainable road, public transport and active travel networks to enable economic activity, essential services and social connections between and within our cities, regions and communities*.'

The Statement of Strategy includes a commitment to '*support any necessary adaptation of our critical transport infrastructure and services in response to Ireland's changing climate*.'

The Statement of Strategy mission is "*To deliver an accessible, efficient, safe and sustainable transport system that supports communities, households and businesses*."

In regard to connectivity, the Strategy sets out that:

'Aligned with the National Planning Framework and the National Economic Plan we will maintain and develop high quality sustainable road, public transport and active travel networks to enable economic activity, essential services and social connections between and within our cities, regions and communities.'

3.5.4.1 Proposed Scheme Response

The Proposed Scheme will provide the infrastructure necessary to support a high quality and sustainable road, public transport and active travel network along the route. The Proposed Scheme will contribute towards economic recovery through enhanced connectivity by improving both bus and cycle infrastructure allowing for greater modal choices.

3.5.5 National Sustainable Mobility Policy

The National Sustainable Mobility Policy (Department of Transport, 2022) sets a framework for active travel and public transport to support the 51% reduction in greenhouse gas emissions by 2030. The vision for the policy is: *'To connect people and places with sustainable mobility that is safe, green, accessible and efficient.'*

The Policy includes three key principles, as follows:

1. Safe and Green Mobility;
2. People Focused Mobility; and
3. Better Integrated Mobility.

The principles are supported by 10 'high level goals' and those considered relevant to the Proposed Scheme are set out further below.

The foreword of the policy document comments, as follows:

> *'Increased funding under the National Development Plan will allow us to improve and expand walking, cycling and public transport options across the country to enable access to education, health care, work, cultural and public life by sustainable modes of travel. This will include commencing delivery of*

> *BusConnects programmes in our five cities, DART+ and Metrolink in Dublin along with increased investment in the inter-urban and regional rail network.'*

In regard to walking and cycling infrastructure the Introduction section states:

> *'The design of walking and cycling infrastructure, as well as areas in the vicinity of public transport services, are important safety factors. Well-designed, well-maintained, appropriately-lit, continuous and better integrated infrastructure can help people feel safe and encourage them to choose these options over the private car…..Expanding walking and cycling options to promote greater use of active travel can support our climate targets to reduce emissions as well as improving fitness levels and public health, and reducing congestion and private car use. Diverting short car trips to active modes will have a particular benefit in reducing air pollution'*

It further comments:

> *'There is a need to rebalance transport movement in metropolitan areas and other urban centres away from the private car and towards active travel and public transport. This will require a greater allocation of available road/street space to be given to sustainable mobility. In addition, a rebalancing of traffic light signaling at junctions to better facilitate walking, cycling and public transport is required. The overarching objective in urban centres should be to focus more on the movement of people rather than the movement of the private car.'*

Under the heading '*Implementation, monitoring and review'* it sets out that:

> *'The Leadership Group will report to the Minister for Transport on a quarterly basis and progress on implementation of the Policy will be overseen In order to measure progress'. It further outlines that part of the reporting will include (inter alia):*
>
> - *'Kilometres of active travel infrastructure developed annually; and*
> - *Kilometres of bus lanes/bus priority developed annually.*'

The Policy supports '*Safe and Green Mobility'* by (inter alia):

> *'Expanding bus capacity and services through the BusConnects Programmes in the five cities of Cork, Dublin, Galway, Limerick and Waterford; improved town bus services; and the Connecting Ireland programme in rural areas'.*

Under the heading '*Expand availability of sustainable mobility'* it comments, as follows:

> *'Improving active travel infrastructure in both urban and rural areas together with improved and expanded public transport services across the country is needed to reduce car dependency. Increased investment in walking and cycling infrastructure will provide a safe and connected network to those who wish to travel by active means. Implementation of public transport projects such as* (inter alia*): BusConnects.'*

Projects such as BusConnects are identified as key priorities to deliver an improved and expanded bus service. It sets out under Goal 3 '*Expand availability of sustainable mobility in metropolitan areas'* the following:

> *'BusConnects programmes comprise a number of different elements including the network redesign of bus services and the development of core bus corridors infrastructure, including segregated cycling facilities, on the busiest routes to make journeys'.*

It also outlines that:

> *'Our bus system carries by far the greatest number of passengers across the public transport system and improvements to it are vital in the context of improving people's accessibility and increasing modal shift. Improved and expanded bus services and infrastructure are a key priority, and in the five metropolitan areas, these improvements and expansions will be delivered through BusConnects programmes in each.'*

It further comments that:

'BusConnects will enhance the capacity and potential of the public transport system by increasing and replacing the bus fleets with low emission vehicles and introducing a new system of Next Generation Ticketing and cashless payments.'

Table 3.3 sets out how the Proposed Scheme meets the Principles and Goals of the National Sustainable Mobility Policy.

Table 3.3: National Sustainable Mobility Policy Principles and Goals

Principle	Goal	Goal Number and Supporting Text	Proposed Scheme Response
Safe and Green Mobility	*'Improve mobility safety.'*	*'Goal 1 aims to improve the safety of all mobility options including active travel, road and rail to prioritise the safety and security of those working on / travelling by sustainable mobility.'*	Signage and road markings will be provided along the extents of the Proposed Scheme to clearly communicate information, regulatory and safety messages to the road users. The Proposed Scheme will also generally include segregated cycling and enhanced at grade junctions improving overall safety along the corridor.
	'Decarbonise public Transport.'	*'Goal 2 aims to reduce emissions by transitioning the bus, rail and small public service vehicle (SPSV) fleet across the country to low/zero emission vehicles in line with available technology. The actions under this goal are aligned with the actions in the Climate Action Plan 2021 to reduce emissions in the sustainable mobility sector.'*	The Proposed Scheme aligns with the goal as it will make public transport and active travel a key component to the solution. The Proposed Scheme will comprise transport infrastructure that supports the delivery of an efficient, low carbon and climate resilient public transport service.
	'Expand availability of sustainable mobility in metropolitan areas.'	*'Goal 3 aims to expand the capacity and availability of sustainable mobility in our five cities (Cork, Dublin, Galway, Limerick and Waterford). This will be done through improved walking, cycling, bus and rail infrastructure, improved transport interchange and expanded public transport services. Transformed active travel and bus infrastructure and services in all five cities is fundamental to achieving the targets of 500,000 additional daily active travel and public transport journeys and a 10% reduction in kilometres driven by fossil fueled cars by 2030.'*	The Proposed Scheme aligns with the goal as BusConnects Dublin – Core Bus Corridor Infrastructure Works is the National Transport Authority's programme to greatly improve bus services in the Greater Dublin Area, of which the Proposed Scheme is part. The Proposed Scheme will provide the advantage of segregated cycling facilities along the preferred route in both directions, where possible. These high-quality cycle lanes will help to reduce dependency on private car use for short journeys. The design of each junction has given priority to pedestrian, cycle and bus movements, where possible. Junctions have been designed to ensure a high level of comfort and priority for sustainable modes of travel (e.g. walking, cycling and public transport) by prioritising the space and time allocated to these modes within the operation of a junction. Along the Proposed Scheme route, improvements and enhancements will be made to footpaths, walkways and pedestrian crossings.
	'Expand availability of sustainable mobility in regional and rural areas.'	*'Goal 4 aims to expand the capacity and availability of sustainable mobility in a regional and rural context. This will be done through the delivery of improved active travel infrastructure, expansion of regional bus and rail services and local bus networks, and improved connectivity between different transport modes.'*	The Proposed Scheme aligns with the goal as it will expand the capacity of the public transport network within Dublin. The Proposed Scheme will also enhance interchanges between the various modes of public transport operating in Dublin City and its wider metropolitan area. The design has been developed with this in mind and, in so far as possible, is seeking to provide for improved existing or new interchange opportunities with other

Principle	Goal	Goal Number and Supporting Text	Proposed Scheme Response
			transport services.
	'Encourage people to choose sustainable mobility over the private car.'	*'Goal 5 aims to encourage modal shift to more sustainable options across all ages through behavioral change and demand management measures.'*	The Proposed Scheme will promote a modal shift from private car use to more sustainable forms of transport. It will enhance active travel networks and thus will encourage the use of these modes, reducing reliance on the private car.
People Focused Mobility	*'Take a whole of journey approach to mobility, promoting inclusive access for all.'*	*'Goal 6 aims to support a whole of journey approach from planning a journey to arriving at the final destination and make sustainable mobility accessible and affordable to everyone. A whole of journey approach is also supported under Goals 7 and 10 through implementing a universal design approach to the design of new and retrofitted infrastructure; adherence to the Design Manual for Urban Roads and Streets; and promoting integrated mobility through innovative technologies.'*	The Proposed Scheme aligns with the goal as it has considered the Design Manual for Urban Roads and Streets (Department of Transport formerly known as Department of Transport, Tourism and Sport 2013) and the National Cycle Manual (NTA 2011). In addition, a disability audit has been undertaken for the Proposed Scheme and has informed the design thereby promoting access for all.
	'Design infrastructure according to Universal Design Principles and the Hierarchy of Road Users model.'	*'Goal 7 aims to support enhanced permeability and ensure that the universal design principle and Hierarchy of Road Users model is used to inform future investment decisions to reduce inequalities, support a whole of journey approach, and prioritise sustainable mobility.'*	The Proposed Scheme aligns with the goal as Chapter 6 (EIAR Traffic & Transport) has considered the Permeability best practice guide (NTA 2015) as part of the project.
	'Promote sustainable mobility through research and citizen engagement.'	*'Goal 8 aims to improve research and citizen engagement around sustainable mobility and collaboration with other government departments, agencies and stakeholders in delivering the Policy.'*	A consultation exercise has been undertaken and has helped to inform the design and layout of the Proposed Scheme. The NTA is also working in partnership with various government departments and third parties to deliver a high quality sustainable transport scheme for Dublin.
Better Integrated Mobility	*'Better integrate land use and transport planning at all levels.'*	*'Goal 9 aims to support compact growth and transport – oriented development through better integrated land use and transport planning.'*	The Proposed Scheme will enhance the capacity of sustainable transport infrastructure as well as the efficiency of Dublin's road network. The enhanced sustainable transport provision along the scheme corridor can help to achieve greater land use densities that will promote compact sustainable growth.
	'Promote smart and integrated mobility through innovative technologies and development of appropriate regulation.'	*'Goal 10 aims to make the use of sustainable mobility and the interchange between different modes easier through investment in smart digital solutions. Alongside better integrated land use and transport planning, technological advances in transport can enable people to move seamlessly from one mode to another and support a whole of journey approach.'*	The Proposed Scheme aligns with the goal as it will enhance interchanges between the various modes of public transport operating in Dublin City and its wider metropolitan area, both now and in the future.

3.5.5.1 Proposed Scheme Response

The Proposed Scheme is supported by the National Sustainable Mobility Policy. The Proposed Scheme as part of the BusConnects Programme is identified as a key project to help deliver Irelands climate commitments and reduction of greenhouse gas emissions from the transport sector. The implementation of the Proposed Scheme

will contribute to modal shift towards sustainable transport options, it will expand, enhance and connect to pedestrian and cycle networks.

3.5.6 Smarter Travel – A Sustainable Transport Future: A New Transport Policy for Ireland 2009 – 2020

The Department of Transport, Tourism and Sport (DTTAS) Smarter Travel - A Sustainable Transport Future: A New Transport Policy for Ireland 2009 – 2020 (hereafter referred to as Smarter Travel) (DTTAS 2009a) is the National planning policy document to deliver an integrated transport policy for Ireland as supported by Government. A Strategic Environmental Assessment (SEA) and Appropriate Assessment (AA) were carried out as part of Smarter Travel.

It sets out a series of actions and measures covering infrastructural and policy elements to promote and encourage the vision of a sustainable travel and transport system for the period 2009 to 2020. The Smarter Travel Policy also provides funding over the lifetime of the Policy to provide information and improve facilities for cyclists, walkers, and public transport users.

The vision presented in Smarter Travel is summarised by five key goals:

- *'Improve quality of life and accessibility to transport for all and, in particular, for people with reduced mobility and those who may experience isolation due to lack of transport'*;
- '*Improve economic competitiveness through maximising the efficiency of the transport system and alleviating congestion and infrastructural bottlenecks'*;
- '*Minimise the negative impacts of transport on the local and global environment through reducing localised air pollutants and greenhouse gas emissions*';
- '*Reduce overall travel demand and commuting distances travelled by the private car*'; and
- '*Improve security of energy supply by reducing dependency on imported fossil fuels*'.

In regard to Public Transport, it sets out that:

> '*We estimate that by 2020 we will need to provide public transport to meet the needs of an additional 90,000 commuters on top of the 140,000 likely to be catered for by Transport 21. The bus will be at the heart of moving these additional people*.'

It further comments that:

> '*Bus use is particularly important for those without access to a car, the young, older people and people with mobility issues. If we are to encourage the use of public transport in Ireland, the availability of a safe, accessible, integrated and reliable service for 18+ hours of the day is essential in any attempts to increase patronage and gain more users*.'

Table 3.4 sets out how the Proposed Scheme meets the key goals of Smarter Travel.

Table 3.4: Key Goals - Smarter Travel

Key Goals	How the Proposed Scheme meets the Key Goals of Smarter Travel
'Improve quality of life and accessibility to transport for all and, in particular, for people with reduced mobility and those who may experience isolation due to lack of transport'	More bus shelters, seating, accessible footways and bus infrastructure to make the bus transit experience more accessible for users of all abilities and ages. Provision and enhancement of cycling facilities along the Proposed Scheme, creating routes that are safe, accessible and attractive for people of all abilities and ages.

Key Goals	How the Proposed Scheme meets the Key Goals of Smarter Travel
'Improve economic competitiveness through maximising the efficiency of the transport system and alleviating congestion and infrastructural bottlenecks'	Accessibility to jobs and education that underpin the economy is of fundamental importance. The Proposed Scheme will bring enhanced access options to Dublin's employment and educational centres by improving bus speeds, reliability and punctuality through the provision of bus lanes and other measures.
'Minimise the negative impacts of transport on the local and global environment through reducing localised air pollutants and greenhouse gas emissions'	The Proposed Scheme comprises transport infrastructure that supports the delivery of an efficient, low carbon and climate resilient public transport service. The EIA assessment has been carried out according to best practice and guidelines relating to climate and greenhouse gas (GHG) emissions, and in the context of similar large-scale transport infrastructural projects. The assessment of potential air quality impacts associated with Construction Phase activities concludes that the works will be temporary and/or short-term in nature, and with the application of the proposed mitigation measures, the impact on air quality will not be significant. No mitigation measures are required during the Operational Phase as the assessment identifies a generally negligible or beneficial impact on air quality in the vicinity of the Proposed Scheme. These impacts are predicted to reduce to negligible by 2043. The assessment concludes that the overall the impact on air quality along the Proposed Scheme will neutral and long-term. Overall, when the carbon emissions associated with the maintenance phase and the Operational Phase are combined, the net greenhouse gas emissions will not be significant. Thus, the residual impact from Operational Phase traffic as a result of the Proposed Scheme will be Positive, Minor and Permanent. The CBC Infrastructure Works will also support the delivery of government strategies outlined in the Climate Action Plan and the 2021 Climate Act by enabling sustainable mobility and delivering a sustainable transport system, aligning with the aims to provide enhanced walking, cycling and bus infrastructure on key access corridors in the Dublin region. This will subsequently enable and deliver integrated sustainable transport movement along these corridors (including the Proposed Scheme). The CBC Infrastructure Works will provide connectivity and integration with other public transport services leading to more people availing of public transport.
'Reduce overall travel demand and commuting distances travelled by the private car'	The Proposed Scheme aligns with the objective as it will promote modal shift from private car to a more sustainable forms of transport. It enhances active travel networks and thus encourages the use of these modes reducing reliance on the private car.
'Improve security of energy supply by reducing dependency on imported fossil fuels'	The Proposed Scheme aligns with the goal as it is providing the infrastructure necessary to facilitate sustainable transport.

3.5.6.1 Proposed Scheme Response

The Proposed Scheme is supported by what Smarter Travel (DTTAS 2009b) states in relation to public transport in that it is recognised that a safe, accessible service is essential to increase patronage. The Proposed Scheme will maximise the efficiency of the transport network through the integration of cycling and public transport modes and support the provision of sustainable transport alternatives to reliance on car-based journeys.

3.5.7 The National Cycle Policy Framework (NCPF) 2009 – 2020

The National Cycle Policy Framework 2009-2020 (hereafter referred to as the NCPF) (DTTAS 2009b) is Ireland's cycling policy framework. The vision is to create a strong cycling culture in Ireland, stating that '*Cycling will be a normal way to get about, especially for short trips'*. The NCPF outlines 19 specific objectives, so that by the year 2020, 10% of all journeys made were intended to be by bike. This policy framework outlines a number of interventions to make cycling easier and safer.

The interventions specific to the Proposed Scheme are set out below in Table 3.5.

Table 3.5: NCPF Intervention and Objectives

Interventions and Objectives	How the Proposed Scheme meets the Interventions and Objectives
'We will pay special attention to integrating cycling and public transport (PT). As commuting distances are lengthening, the importance of combining the bicycle with the bus, tram or train grows. We will provide state-of-the-art cycling parking at all appropriate PT interchanges and stops.'	The Proposed Scheme aligns with the objective as it will enhance the interchange between the various modes of public transport operating in the city and wider metropolitan area, both now and in the future. Bus Infrastructure as well as cycle and pedestrian infrastructure largely run in parallel proximate to each other which improves the potential for interchange between the modes. Furthermore, bike racks will generally be provided where practicable at Bus Stops.
Objective 2: 'Ensure that the urban road infrastructure is designed/retrofitted so as to be cyclist-friendly and that traffic management measures are also cyclist friendly'	The design of each junction has given priority to pedestrian, cycle and bus movements. Junctions have been designed to ensure a high level of comfort and priority for sustainable modes of travel e.g. walking, cycling and public transport by prioritising the space and time allocated to these modes within the operation of a junction.
Objective 8: 'Ensure proper integration between cycling and public transport' will assist in increasing the uptake in cycling across the region.'	The Proposed Scheme aligns with the objective as it will provide improved travel times combined with increased services, which will promote an efficient, reliable and frequent public transport service as well as provide the advantage of segregated cycling facilities along the preferred route in both directions. Also, as set out above, bus stops will include bike parking where possible to encourage / facilitate interchange between modes.

The NTA's Canal Cordon Count measures the number of trips into Dublin City Centre on a typical morning in November of each year. Data is collected for all common modes of transport including walking and cycling. Transport Trends 2020 (DoT 2021a) states that data for 2019 shows an increase in the number of cyclists recorded entering the city to 13,131, up from 12,227 in 2018. It should be noted that the 2019 data represents the last Canal Cordon Count dataset prior to the effects of the COVID-19 pandemic on travel patterns and volumes entering Dublin City Centre.

3.5.7.1 Proposed Scheme Response

The Proposed Scheme is supported by the objectives set in the NCPF through the provision of safe cycling infrastructure segregated from general traffic, wherever practicable. In addition, the Proposed Scheme provides bike parking adjacent to bus stops to encourage interchange between bus and cycle modes in accordance with the objectives of the NCPF.

3.5.8 Road Safety Strategy 2021 – 2030

The Road Safety Strategy 2021 – 2030 (RSA 2021) works towards achieving 'Vision Zero' which is to achieve the long term goal of eliminating deaths and serious injuries in road traffic collisions by 2050. The strategy '*involves the promotion of the safer modes (e.g., public transport, such as bus and rail travel), and the promotion and*

provision of safe road environments for otherwise healthy, active modes. This includes walking and cycling, where the risks of death and serious injury in the event of a collision are higher than for protected in-vehicle road users.'

The Strategy acknowledges that '*The promotion and increased uptake of public transport can greatly contribute to fatality and serious injury reductions over the course of the 2021-2023 strategy'*. It continues '*The substantial societal benefits of increased active travel (i.e. walking or cycling) must also be acknowledged in light of Ireland's climate objectives, including reduced emissions, traffic congestion and noise pollution, and increased physical activity and its related health benefits*.'

A key action of Phase 1 of the strategy, during the 2021 – 2025 period is to '*construct 1,000km of segregated walking and cycling facilities to provide safe cycling and walking arrangements for users of all ages'.*

3.5.8.1 Proposed Scheme Response

The Proposed Scheme will provide the infrastructure necessary to facilitate a public transport network which the Strategy acknowledges is a '*safer mode'* of travel. The Proposed Scheme will contribute to improved road safety through improvement works at key junctions and upgrades to the pedestrian and cycling infrastructure along the route. The Proposed Scheme provides for significant additional segregation between active travel users and the public road to help enhance safety.

3.5.9 Climate Action and Low Carbon Development (Amendment) Act 2021

The Climate Action and Low Carbon Development (Amendment) Act 2021 (Government of Ireland 2021) sets out the central objective relating to emission reductions. It legally binds Ireland to have net-zero emissions no later than 2050 and to a 51% reduction in emissions by the end of the decade (2030), against a base of 2018 emissions. The Act sets out the following:

> *'The first two carbon budgets proposed by the Advisory Council shall provide for a reduction in greenhouse gas emissions such that the total amount of annual greenhouse gas emissions in the year ending on 31 December 2030 is 51 per cent less than the annual greenhouse gas emissions reported for the year ending on 31 December 2018, as set out in the national greenhouse gas emissions inventory prepared by the Agency.'*

3.5.9.1 Proposed Scheme Response

The implementation of the Proposed Scheme will deliver transport infrastructure required to support a significant shift towards sustainable transport options that will in turn support the targets set out in the Climate Action and Low Carbon Development (Amendment) Act 2021.

3.5.10 Climate Action Plan 2021

The Climate Action Plan 2021 (Government of Ireland 2021b) sets out at a National level how Ireland is to halve its emissions by 2030 (51% reduction) and reach net zero no later than 2050. The Climate Action Plan is a road map to delivering Irelands climate ambition. There are 475 actions identified that extend to all sectors of the economy aiming to transform Ireland into a low carbon nation over the next three decades.

In regard to modal shift the Climate Action Plan 2021 sets out that:

> *'The proposed pathway in transport is focused on accelerating the electrification of road transport, the use of biofuels, and a* ***modal shift*** *to transport modes with lower energy consumption (e.g. public and active transport)'.* (emphasis added).

Promoting more sustainable travel modes is seen as critical for climate policy. It offers an opportunity to '*improve our health, boost the quality of our lives, meet the need of our growing urban centres and connects our rural, urban and suburban communities'.*

The key targets to meet the emissions reduction include:

- *'Provide for an additional 500,000 daily public transport and active travel journeys';*
- *'Develop the required infrastructural, regulatory, engagement, planning, innovation and financial supports for improved system, travel, vehicle and demand efficiencies';* and
- *'Reduce ICE [1]kilometres by c. 10% compared to present day levels'.*

ICE reduction measures include:

- *'Reallocating road space from the private car to prioritise walking, cycling and public transport';*
- *'Enhancing permeability for active travel'; and*
- *'Delivering safer walking and cycling routes to encourage greater uptake of active transport.'*

BusConnects is referenced as a major transport project that will help to deliver the 500,000 additional sustainable journeys. A key goal of the plan is to provide citizens with reliable and realistic sustainable transport options. The Climate Action Plan further states:

> '*The new approach to public transport will be based on a vision of an integrated public transport network, enabling short, medium and long distance trips for people in every part of Ireland. This will mean increasing the frequency of existing rail and bus services and expanding the road network through the Connecting Ireland approach.'*

Table 3.6 describes the Actions and how the Proposed Scheme meets the specific action.

Table 3.6: Climate Action Plan Transport Actions

Action Number	Action	How the Proposed Scheme meets the Action
225	*'Continue the improvement and expansion of the Active Travel and Greenway Network'*	The Proposed Scheme will promote active travel through the provision of enhanced cycle and pedestrian infrastructure.
227	*'Construct an additional 1,000km of cycling and walking infrastructure'*	The Proposed Scheme aligns with the action as it will provide segregated cycling facilities along the Proposed Scheme in both directions.
228	*'Encourage an increased level of modal shift towards Active travel (walking and cycling) and away from private car use'*	The Proposed Scheme will provide the infrastructure required to promote modal shift from private car to a more sustainable forms of transport and increased bus priority which are key actions in the plan.
233	*'Commence delivery of BusConnects Network Redesign Dublin'*	BusConnects Dublin Programme is the National Transport Authority's programme to greatly improve bus services in the Greater Dublin Area of which the Proposed Scheme is part.
235	*'Commence delivery of BusConnects Core Bus Corridor Infrastructure Works'*	BusConnects Dublin Programme is the National Transport Authority's programme to greatly improve bus services in the Greater Dublin Area of which the Proposed Scheme is part.
256	*'Deliver sustainable bus priority measures on the National Road Network'*	The Proposed Scheme will provide the infrastructure required to increase bus priority which is a key action of the plan. The Proposed Scheme includes the provision of enhanced bus priority measures for existing (both public and private) and all future services who will use the corridor.

3.5.10.1 Proposed Scheme Response

The delivery of the Proposed Scheme will provide the transport infrastructure required to provide sustainable transport options that will support the key actions set out in the Climate Action Plan 2021. The Proposed Scheme will expand, enhance and connect to pedestrian and cycle networks and will assist in facilitating the delivery of modal shift.

[1] Internal Combustion Engine

BusConnects will support the delivery of an efficient low carbon and climate resilient public transport service, contributing to emission reduction target achievement. BusConnects will contribute to Ireland's journey to a low carbon / carbon neutral, energy efficient and reliable transport system which aligns with Government net zero policy commitments and enable customers to make sustainable choices.

Acknowledging that various policy initiatives are required to deliver national targets that are aligned to the Paris Agreement, BusConnects can facilitate services that are beneficial to communities. While mandated reductions are not required at an individual scheme level, carbon must be invested wisely. Chapter 8 (Climate) in Volume 2 of the EIAR, contains an assessment of the greenhouse gas emissions associated with the Proposed Scheme.

3.5.11 Programme for Government – Our Shared Future 2020

The Programme for Government – Our Shared Future 2020 (hereafter referred to as the Programme for Government) (Government of Ireland 2020) sets out the Government's plan for the next five years. It sets out to, '*Develop and implement existing strategies for our cities such as 'the greater Dublin Area Transport Strategy'.* The key objectives of the programme include:

- '*Address pinch points for buses and expand priority signaling for buses and real time information;* and
- *Give greater priority to bus services by expanding quality bus corridors and consider the introduction of Bus Rapid Transport services.'*

Specifically, in regard to BusConnects, the Programme for Government states it will also *'prioritise plans for the delivery of…BusConnects in Dublin'.*

3.5.11.1 Proposed Scheme Response

The BusConnects Programme, with the Proposed Scheme forming an important part, continues to be identified as a key project to help deliver Ireland's long-term growth aspirations and climate commitments. The Proposed Scheme is to be delivered as part of the Programme for Government (Government of Ireland 2020) and fully complies with the key objectives of same.

3.5.12 Building on Recovery: Infrastructure and Capital Investment 2016 – 2021

The Building on Recovery: Infrastructure and Capital Investment Plan (Department of Public Expenditure and Reform 2015) (hereafter referred to as the Capital Plan) was published by the Department of Public Expenditure and Reform in September 2015. It presented the findings of a Government-wide review of infrastructure and capital investment policy and outlined the Government's commitment to ensuring that the country's stock of infrastructure is capable of facilitating economic growth.

This report identifies the need to improve public transport facilities noting:

> *'It is therefore essential that road, rail and public transport networks are developed and maintained to the standard required to ensure the safe and efficient movement of people and freight. In addition, getting people out of cars and onto public transport has a key role to play in reducing Ireland's carbon emissions, by providing a viable, less polluting alternative to car and road transport for many journeys.'*

The transport capital allocation in this Capital Plan is largely framed by the recommendations and priorities set out in the 2015 DTTAS Strategic Investment Framework for Land Transport (DTTAS 2015), which centre on:

- Maintaining and renewing the strategically important elements of the existing land transport system;
- Addressing urban congestion; and
- Maximising the contribution of land transport networks to our national development.

The Capital Plan incorporates the following key objectives relevant to this Proposed Scheme:

- €3.6 billion of Public Transport Investment including further upgrading of Quality Bus Corridors.

3.5.12.1 Proposed Scheme Response

The Proposed Scheme is supported by these recommendations, priorities and objectives as set out in the Strategic Investment Framework for Land Transport (DTTAS 2015), and the Capital Plan. The Proposed Scheme is a significant investment in the improvement of public transport facilities including bus, cycle and pedestrian network enhancements and extensions.

3.5.13 The Sustainable Development Goals National Implementation Plan 2018 – 2020

The UN's 2030 Agenda aims to deliver a more sustainable, prosperous, and peaceful future for the entire world. The Sustainable Development Goals National Implementation Plan 2018 - 2020 (DCCAE 2018) is in direct response to the 2030 Agenda for Sustainable Development and provides a whole-of-government approach to implement the 17 SDGs.

The Sustainable Development Goals National Implementation Plan also sets out 19 specific actions to implement over the duration of this first SDG National Implementation Plan. Goals 9 and 11 are particularly relevant to the Proposed Scheme. These are set out in Table 3.7.

Table 3.7: Sustainable Development Goals and Targets aligned with the Proposed Scheme

Goal 9: Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation	
Target 9.1	Develop quality, reliable, sustainable, and resilient infrastructure, including regional and trans-border infrastructure, to support economic development and human wellbeing, with a focus on affordable and equitable access for all.
Goal 11: Make cities and human settlements inclusive, safe, resilient, and sustainable	
Target 11.2	By 2030, provide access to safe, affordable, accessible, and sustainable transport systems for all, improving road safety, notably by expanding public transport, with special attention to the needs of those in vulnerable situations, women, children, persons with disabilities and older persons.

3.5.13.1 Proposed Scheme Response

The Proposed Scheme supports the goals and targets set out in the Sustainable Development Goals National Implementation Plan as it provides infrastructure that will support sustainable transport and will improve the safety of road users through the segregation of road vehicles and active travel modes.

3.5.14 Investing in Our Transport Future – Strategic Framework for Investment in Land Transport 2015

Investing in Our Transport Future – Strategic Investment Framework for Land Transport (DTTAS 2015) (hereafter referred to as SFILT) sets out the priorities to guide the allocation of future investment to develop and manage Irelands transport network. It establishes:

- *'High level priorities for future investment in land transport; and*
- *Key principles, reflective of those priorities, to which transport investment proposals will be required to adhere'.*

Addressing urban congestion and maximising the contribution of land transport networks to our national development are key priorities of the SFILT Measures, including:

- *'Improved and expanded public transport capacity';*
- *'Improved and expanded walking and cycling infrastructure'*; and
- '*Support identified national and regional spatial planning priorities'*.

The key principles for land transport investment proposals are:

- *'The foremost priority for land transport funding should be the maintenance and renewal of identified strategically important elements of the existing land transport system, so as to protect earlier investment and maintain essential functioning';*
- *'The second key priority for future investment involves measures to address current and future urban congestion including, in particular, improved public transport and additional transport capacity, better and additional walking and cycling infrastructure, improving efficiency and increased use of Intelligent Transport Systems';* and
- *'To receive funding, transport projects must be implemented in conjunction with the implementation of supportive national and regional spatial planning policies, along with other demand management measures where appropriate'.*

The SFILT states '*that the overall outcomes of transport investment, as governed by these principles, should maintain and improve the quality of life of citizens and be consistent with environmental, climate and biodiversity objectives, imperatives and obligations, including those arising from the EU Habitats Directive'*.

3.5.14.1 Proposed Scheme Response

The Proposed Scheme is supported by the 'priorities' set out by the SFILT (DTTAS 2015) as the infrastructure will support the improvement and expansion of public transport capacity and provide significantly improved facilities for active travel. The Proposed Scheme will improve the efficiency of public transport and encourage mode shift through delivering journey time savings and reliability on the corridor.

3.6 Regional Policy

3.6.1 Transport Strategy for the Greater Dublin Area 2016 – 2035

The NTA Transport Strategy for the Greater Dublin Area 2016 - 2035 (hereafter referred to as the GDA Transport Strategy) (NTA 2016) has been prepared in accordance with Section 12 of the Dublin Transport Authority Act 2008 (as amended) and was approved in April 2016 by the Minister for Transport, Tourism and Sport. The GDA Transport Strategy is an essential component for the orderly development of the GDA over the next 20 years. The purpose and primary objective of the GDA Transport Strategy is '*to contribute to the economic, social and cultural progress of the Greater Dublin Area by providing for the efficient, effective and sustainable movement of people and goods*'.

The GDA Transport Strategy sets out the necessary transport provisions, for the period up to 2035, to achieve the above objective for the region.

As part of the GDA Transport Strategy the Core Bus Network is to be developed to achieve a continuous priority for bus movement on sections of the Core Bus Network within the Metropolitan area. This is to be achieved through enhanced bus lane provisions and the removal of delays along the routes to enable the bus to provide a faster mode of transport than the private car along these routes.

The GDA Transport Strategy highlights Core Radial Bus Networks under the heading '*Bus Infrastructure'* and sets out that:

> '*In order to ensure an efficient, reliable, and effective bus system, it is intended, as part of the Strategy, to develop the Core Bus Network to achieve, as far as practicable, continuous priority for bus movement on the portions of the Core Bus Network within the Metropolitan Area. This will mean enhanced bus lane provision on these corridors, removing current delays on the bus network in the relevant locations and enabling the bus to provide a faster alternative to car traffic along these routes, making bus transport a more attractive alternative for road users. It will also make the overall bus system more efficient, as faster bus journeys means that more people can be moved with the same level of vehicle and driver resources*.'

Section 5.6 of the GDA Transport Strategy sets out cycle policy in the GDA. The routes identified in the GDA Transport Strategy are those established in the Greater Dublin Area Cycle Network Plan.

The provisions of the GDA Transport Strategy (including bus-based transport modes) were evaluated for potential significant effects, and measures integrated into the Strategy on foot of SEA recommendations in order to ensure that potential adverse effects were mitigated.

The Draft GDA Transport Strategy 2022- 2042 has now been published for consultation and this is reviewed in section 3.6.3 below.

3.6.1.1 Proposed Scheme Response

The need for the Proposed Scheme is supported by the GDA Transport Strategy as it will provide infrastructure required to facilitate *'a continuous priority for bus movement on sections of the Core Bus Network within the Metropolitan area*.' The Proposed Scheme will realise the objectives of the GDA Transport Strategy by providing the enhanced bus lanes, removing 'bottlenecks' and making the bus a faster option to commuters than car-based transport.

3.6.2 GDA Transport Strategy Integrated Implementation Plan 2019 - 2024

The NTA is required to prepare a series of 'Integrated Implementation Plans' (for the GDA Transport Strategy) (NTA 2016) under Section 13(1) of the Dublin Transport Authority Act 2008 (as amended). These plans set out the transport planning investment priorities over a six-year period. The most recent Integrated Implementation Plan 2019 – 2024 (hereafter referred to as the 2019 Implementation Plan) (NTA 2019) was published in December 2019. An SEA and AA was prepared as part of the Implementation Plan process.

An Integrated Implementation Plan is required to comprise '*inter alia*';

- An infrastructure investment programme, identifying the key objectives and outputs to be pursued by the Authority over the period of the Plan; and
- The actions to be taken by the Authority to ensure the effective integration of public transport infrastructure over the period of the Plan.

The 2019 Implementation Plan was prepared to be aligned with the Government's review on capital spending. As such, the 2019 Implementation Plan identifies the key objectives and outputs to be followed by the NTA within the corresponding period of the NDP (Government of Ireland 2018a) and the actions to be taken to ensure effective integration of public transport infrastructure. The key objectives of the 2019 Implementation Plan include to:

- '*Provide a well-designed and effective bus network that optimises routes and services to meet passenger demand;*
- *Ensure the efficient use of available resources in delivering bus services;*
- *Seek to reduce overall journey times and improve the reliability of bus services;*
- *Improve service patterns by enhancing services in off-peak periods, in the evenings, and at weekends. 24-hour bus services will be introduced on key cross-city corridors in Dublin;*
- *Develop greater interchange with other transport modes;'*
- *'Provide an attractive, comfortable, clean, accessible and modern bus fleet'*;
- *'Improve the environmental performance of the bus fleet'*; and
- *'Building a network of new bus corridors on the busiest bus routes to make bus journeys faster, predictable, and reliable'.*

The Implementation Plan also sets out under the heading *'Strategic Framework for Investment in Land Transport'* that:

> *'it is not just the bus system that will be transformed under BusConnects Dublin. The same corridors that are important for buses are also the main cycling routes in the city. BusConnects Dublin will see safe cycling facilities provided along each corridor, segregated as far as practicable from other traffic. The cycling infrastructure delivered under this programme will form the core of the region's cycling network and deliver a radical step change in cycling facilities.'*

The background to the 2019 Implementation Plan was Ireland's continuing emergence from the severe economic recession experienced for a period from 2008 onwards. The 2019 Implementation Plan acknowledged the strong growth in the economy in the years leading up to 2019, with more and more people at work and the number of visitors to the country at record levels. However, alongside the recovery, there were growing challenges identified, with traffic and transport among the key issues facing the Dublin region.

Congestion was identified in the 2019 Implementation Plan as being one of the most significant challenges facing the State. To plan for significant population growth, and associated economic, social, cultural and recreational activity, it is necessary to provide a transport system that not only addresses this challenge but supports and fosters further sustainable development.

The 2019 Implementation Plan recognised the significance of the need for action to reduce the use of fossil fuels and diminish the generation of greenhouse gases. Transport, as a major producer of greenhouse gases, requires transformation to contribute to the achievement of these objectives.

The NTA therefore seeks to ensure primacy for transport options which provide for unit reductions in carbon emissions. This can most effectively be done by improving public transport, walking and cycling infrastructure that can lead to reduced car use dependence in circumstances where alternative options are available.

The overall findings of the SEA of the plan, concluded that the 2019 Implementation Plan will facilitate a mode shift away from the private car to public transport, walking and cycling and associated positive effects.

It is an objective of the 2019 Implementation Plan to build on the work already achieved in the GDA with respect to catering for greater bus movement. The intention set out in the 2019 Implementation Plan is to progress the development of the Core Bus Corridors (the CBC Infrastructure Works) to achieve, as far as practicable, continuous priority for bus movement.

3.6.2.1 Proposed Scheme Response

The Proposed Scheme is supported by the 2019 Implementation Plan's stated aim to *'overhaul the current bus system in the Dublin region by* (inter alia*):*

- *'Building a network of new bus corridors on the busiest bus routes to make bus journeys faster, predictable, and reliable'.*

The Proposed Scheme will provide the infrastructure necessary to deliver the transformational change of the current bus network required to meet objectives such as, greater efficiency, reduction in journey times and improve environmental performance. The Proposed Scheme design has been developed by NTA and takes account of policy objectives in the Implementation Plan.

3.6.3 Draft Greater Dublin Area Transport Strategy 2022 - 2042

The Draft NTA Transport Strategy for the Greater Dublin Area 2022-2042 (NTA 2021a) (hereafter described as the Draft GDATS) was published for consultation on the 9 November 2021 and has been prepared in accordance with Section 12 of the Dublin Transport Authority Act 2008 (as amended). It will replace the previous Transport Strategy for the Greater Dublin Area 2016-2035. Under the Dublin Transport Authority Act 2008, the NTA must review its Transport Strategy every six years. The Draft GDATS is considered to be an essential component for the orderly development of the GDA for the next 20 years. The overall aim of the strategy is '*To provide a sustainable, accessible and effective transport system for the Greater Dublin Area which meets the region's climate change requirements, serves the needs of urban and rural communities, and supports economic growth'.* A key focus of the strategy is to enable increased use of other transport modes to meet environmental, economic and social objectives related to emissions, congestion and car dependency.

The Transport Objective is: *'To deliver a high quality, equitable and accessible transport system, which caters for the needs of all members of society.'*

The Draft GDATS sets out the necessary transport provision, for the period up to 2042, to achieve the above objective for the region.

The Draft GDATS considers that due to the dispersed nature of development in the GDA the bus system represents the most suitable public transport solution across much of the region.

The Draft GDATS comments that the NTA in recent years have introduced a '*step change in the quality of the overall bus system*' through different programmes, one of which being BusConnects. The main objective of these programmes is increasing the share of people using public transport. The Draft GDATS also comments that the NTA intends to have submitted applications to An Bord Pleanála for the 12 Core Bus Corridor Schemes in the early months of 2022. The Draft GDATS further comments:

> *'Subject to obtaining statutory planning approvals, the NTA will proceed to construct these key bus arteries within the Dublin area. They will facilitate faster and more reliable bus journeys on the busiest bus corridors in the Dublin region, making the overall bus system more convenient and useful for more people. In addition, key elements of the Cycling Network Plan for the GDA will be delivered as part of these corridors.'*

The revised GDA Cycle Network forms part of the Draft GDATS, (See Section 3.6.6 below).

The Draft GDATS aims to:

- Increase Cycle Mode Share to 12% by 2042;
- Provide 322km of Primary Cycle network;
- Include 1,060km of Secondary Cycle Network; and
- Promote an additional 450,000 daily cycling trips.

The Draft GDATS sets out a range of measures and those of relevance to the Proposed Scheme are outlined in Table 3.8.

Table 3.8: Draft GDA Transport Strategy 2022 – 2042 Measures

Measure Number	Measure	How the Proposed Scheme meets the Measure
PLAN12 - Urban Design in Major Infrastructure Projects	*'The NTA will incorporate a high standard of urban design and placemaking into the planning and design of all major public transport infrastructure schemes and will consider how greater biodiversity could be fostered.'*	The overall landscape and public realm design strategy for the Proposed Scheme aims to create attractive, consistent, functional and accessible places for people alongside the core bus and cycle facilities. In addition, opportunities have been sought to enhance the public realm and landscape, where possible. All the plants and trees selected will be appropriate to the urban location. The enhancement opportunities include key nodal locations which focus on locally upgrading the quality of the paving materials, extending planting, decluttering of streetscape and general placemaking along the route.
Measure PLAN13 – Urban Design in Walking and Cycling Projects	*'In the design, planning and prioritisation of walking and cycling schemes, the NTA and the local authorities will ensure the incorporation of urban design and placemaking considerations.'*	The overall landscape and public realm design strategy for the Proposed Scheme aims to create attractive, consistent, functional and accessible places for people alongside the core bus and cycle facilities Along the route of the Proposed Scheme, improvements and enhancements will be made to footpaths, walkways, and pedestrian crossings. Additional landscaping and outdoor amenities will be provided, including junction reconfiguration, reinforcement of existing vegetation areas and the establishment of new public realm and landscape opportunity areas. The enhancement opportunities include key nodal locations which focus on locally upgrading the quality of the paving materials,

Measure Number	Measure	How the Proposed Scheme meets the Measure
		extending planting, decluttering of streetscape and general placemaking along the route.
Measure PLAN14 – Reallocation of Road Space	*'The NTA, in conjunction with the local authorities, will seek the reallocation of road space in Dublin City Centre, Metropolitan towns and villages, and towns and villages across the GDA to prioritise walking, cycling and public transport use and prioritise the placemaking functions of the urban street network.'*	The Proposed Scheme will support integrated sustainable transport usage through road space reallocation in support of infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services who will use the corridor. Along the Proposed Scheme road space has been reallocated to provide increased transport options for example: M50 Junction to Chapelizod Bypass section.
MEASURE PLAN16 – The Road User Hierarchy	*'The NTA, in the decision-making process around the design, planning and funding of transport schemes in the GDA, will be guided by the priority afforded to each mode in the Road User Hierarchy as set out in the Transport Strategy.'*	The Proposed Scheme aligns with the measure as it will promote modal shift from private car to a more sustainable forms of transport. It enhances active travel networks and thus encourages the use of these modes reducing reliance on the private car
Measure INT1 – Integration of all Modes in Transport Schemes	*'It is the intention of the NTA, in the design and planning of transport schemes, to ensure that the needs of all transport modes are considered, as appropriate, based on the objectives of the scheme and on the road user hierarchy.'*	The Proposed Scheme aligns with the measure as it will service the current and future transport needs of Dublin. It enhances active travel networks and thus encourages the use of these modes reducing reliance on the private car.
Measure INT5 - Interchange	*'It is the intention of the NTA, in conjunction with local authorities and transport operators, to ensure that passengers wishing to change between services on the transport network are provided with as safe, convenient and seamless interchange experience.'*	The Proposed Scheme aligns with the measure as it will enhance the interchange between the various modes of public transport operating in the city and wider metropolitan area, both now and in the future. The design has been developed with this in mind and, in so far as possible, is seeking to provide for improved existing or new interchange opportunities with other transport services. These include: • GDA Cycle Network (Primary, Secondary and feeder routes); • The Luas Red Line at Heuston Station; • The Kildare rail line at Heuston Station; • Liffey Valley to City Centre Core Bus Corridor at three locations.
Measure INT14 – Walking and Cycling at Night	*'The NTA and local authorities will ensure that personal security and safety for those travelling at night by walking and cycling are carefully considered in the design process for new schemes and in retrofitting existing schemes where such issues arise.'*	The Proposed Scheme has considered security and safety in its design and it provides lighting as appropriate to the end use. The Proposed Scheme will include upgrades to existing public lighting.
Measure INT15 – Accessible Infrastructure	*'During the period of the Transport Strategy, the NTA will ensure that public transport infrastructure, and facilities in the GDA are made accessible for all users.'*	The Proposed Scheme has been designed to include: • More bus shelters, seating, accessible footways and bus infrastructure to make the bus transit experience more accessible for users of all abilities and ages; and • Provision and enhancement of cycling facilities along the Proposed Scheme,

Measure Number	Measure	How the Proposed Scheme meets the Measure
		creating routes that are safe, accessible and attractive for people of all abilities and ages.
Measure WALK3 – Improved Junctions	*'The NTA, in conjunction with local authorities, will implement junction improvements across the GDA as follows:* *• To enhance safety at junctions, a programme of "narrowing" junctions by reducing kerb-line radii will be undertaken as a means of managing vehicular speeds; and* *• To enhance movement by pedestrians and cyclists, a programme of removal of slip lanes will be undertaken at appropriate locations, together with consideration of junction signaling changes to better balance the use of the junction between motorised and vulnerable modes.'*	The Proposed Scheme provides infrastructure that will support sustainable transport and will improve the safety of road users through junction improvement and the segregation of road vehicles and active travel modes. The design of each junction has given priority to pedestrian, cycle and bus movements. Junctions have been designed to ensure a high level of comfort and priority for sustainable modes of travel e.g. walking, cycling and public transport by prioritising the space and time allocated to these modes within the operation of a junction.
Measure WALK8 – Persons with Disabilities	*'Local authorities in the GDA and the NTA will take full account of people with disabilities and pedestrians with mobility impairments when delivering transport schemes which affect the pedestrian environment; and will implement improvements to existing facilities where appropriate and encourage the enforcement of the Road Traffic Laws in this regard.'*	An audit of the existing infrastructures provided for people with disabilities along the Proposed Scheme was carried out to identify any existing issues for mobility-impaired persons. This audit has informed the design of the Proposed Scheme. The audit assessed footpaths, crossings / junctions, bus stops, parking and access for users with disabilities. Traffic signal layout design included accessibility considerations for the mobility impaired. Potential areas of conflict with other non-motorised users were considered to provide suitable separation where possible. It has been designed to include: • More bus shelters, seating, accessible footways and bus infrastructure to make the bus transit experience more accessible for users of all abilities and ages; and • Provision and enhancement of cycling facilities along the Proposed Scheme, creating routes that are safe, accessible and attractive for people of all abilities and ages.
Measure CYC1 – GDA Cycle Network	*'It is the intention of the NTA and the local authorities to deliver a safe, comprehensive, attractive and legible cycle network in accordance with the updated Greater Dublin Area Cycle Network.'*	The Proposed Scheme aligns with the measure as it provides segregated cycling facilities along the route of the Proposed Scheme in both directions. The full route accords with Primary and Secondary routes identified in the updated GDA Cycle Network. These high-quality cycle tracks will generally be 2.0 m in width offering a high level of service and help to reduce dependency on private car use for short journeys.
Measure PT2 – Climate Proofing New Public Transport Infrastructure	*'The NTA will ensure that all new public transport infrastructure is proofed against the potential impacts arising from climate change.'*	The Proposed Scheme aligns with the measure as it comprises transport infrastructure that supports the delivery of an efficient, low carbon and climate resilient public transport service.

Measure Number	Measure	How the Proposed Scheme meets the Measure
Measure BUS1 – Core Bus Corridor Programme	*'Subject to receipt of statutory consents, it is the intention of the NTA to implement the 12 Core Bus Corridors as set out in the BusConnects Dublin programme.'*	The Proposed Scheme is part of the BusConnects programme to enhance bus services and active travel options in the Greater Dublin Area.
Measure BUS10 – New Bus Stops and Shelters	*'It is the intention of the NTA to continue to roll-out the program of bus stop and shelter provision, and to monitor potential for further expansion and upgrade during the lifetime of the strategy.'*	The Proposed Scheme includes additional bus shelters, seating, accessible footways and bus infrastructure to make the bus transit experience more accessible for users.
Measure TM2 – Management of Urban Centres	*'The NTA and relevant local authorities, in collaboration, will deliver the public transport, cycling and walking networks, and public realm that are required to serve local centres, and to facilitate a post-Covid recovery based on sustainable transport.'*	The Proposed Scheme aligns with the measure as it will support sustainable transport modes through infrastructure improvements for active travel (both walking and cycling). The Proposed Scheme will bring greater accessibility to the city centre and other strategic areas for people to avail of housing, jobs, amenities and services. It aims to mitigate any adverse effects that the proposals may have on the streets, spaces, local areas and landscape through the use of appropriate design responses. In addition, opportunities have been sought to enhance the public realm and landscape design where possible.

3.6.3.1 Proposed Scheme Response

The Draft GDA Transport Strategy is currently undergoing consultation and is subject to change. Nonetheless, the Draft Strategy clearly puts the delivery of Dublin BusConnects, of which the Proposed Scheme is part, at the heart of its objectives. There is added emphasis on the delivery of public transport, active travel and enhanced accessibility to sustainable modes of transport, all of which the Proposed Scheme will help to deliver.

3.6.4 Regional Spatial Economic Strategy for the Eastern and Midland Region 2019 – 2031

The principal purpose of the Eastern and Midland Regional Assembly (EMRA) Regional Spatial Economic Strategy for the Eastern and Midland Region 2019 – 2031 (hereafter referred to as RSES) (EMRA 2019a) is to support the implementation of Project Ireland 2040 by providing a long-term strategic planning and economic framework for the development of the Region. An SEA and AA were carried out prior to the adoption of the Strategy.

The RSES represents the Regional tier for planning policy and provides a vision: a spatial plan and investment framework to shape future development of the Eastern and Midland Region to the year 2031. There are also Sub-Regional planning functions: Strategic Planning Areas. The RSES was formally adopted in June 2019 by EMRA and replaces the previous Regional Planning Guidelines for the Greater Dublin Area 2010 – 2022 (Regional Planning Guidelines Office 2010).

The RSES provides key environmental, economic, and social principles for the region. These principles are:

- Healthy Placemaking – to create healthy and attractive places to live, work and study;
- Climate Action – to enhance climate resilience and accelerate a transition to a low carbon economy; and
- Economic Opportunity – to create the right conditions and opportunities for the region to realise sustained economic growth and employment that ensures good living standards for all.

The RSES develops Regional Strategic Outcomes (RSOs) that are aligned to the principles above. These are aligned to the United Nations SDGs (UN 2015), EU thematic objectives (EU 2014) and the NPF (Government of Ireland 2018b).

The RSOs relevant to the Proposed Scheme and the principles to which each is aligned, are:

- Number 2 - Compact Growth and Urban Regeneration - 'Healthy Placemaking';
- Number 4 - Healthy Communities - 'Healthy Placemaking';
- Number 6 - Integrated Transport and Land Use - 'Climate Change';
- Number 9 - Support the Transition to Low Carbon and Clean Energy - 'Climate Change';
- Number 14 - Global City Region - 'Economic Opportunity'; and
- Number 15 – Enhanced Strategic Connectivity - 'Economic Opportunity'.

In the RSES, the policy responses are known as Regional Policy Objectives (RPOs). Those RPOs that relate to the Proposed Scheme are as follows:

> *'RPO4.2: Infrastructure investment and priorities shall be aligned with the spatial planning strategy of the RSES. All residential and employment developments should be planned on a phased basis in collaboration with infrastructure providers so as to ensure adequate capacity for services (e.g. water supply, wastewater, transport, broadband) is available to match projected demand for services and that the assimilative capacity of the receiving environment is not exceeded.'*

The Dublin Metropolitan Area Strategic Plan (hereafter referred to as the Dublin MASP) (EMRA 2019b) is contained within the RSES and identifies the strategic planning and investment framework to enable growth. The Dublin MASP is aligned with the RSOs in the RSES to support integrated transport and land use. The vision for the MASP is as follows:

> *'Over the years to 2031 and with a 2040 horizon, the Dublin metropolitan area will build on our strengths to become a smart, climate resilient and global city region, expanding access to social and economic opportunities and improved housing choice, travel options and quality of life for people who live, work, study in or visit the metropolitan area'.*

To achieve the vision, the Dublin MASP sets Guiding Principles. Those most relevant to the Proposed Scheme are set out below.

> *Compact sustainable growth and accelerated housing delivery – To promote sustainable consolidated growth of the Metropolitan Area, including brownfield and infill development, to achieve a target to 50% of all new homes within or contiguous to the built-up area of Dublin City and suburbs, and at least 30% in other settlements. To support a steady supply of sites and to accelerate housing supply, in order to achieve higher densities in urban built up areas, supported by improved services and public transport.*
>
> *Integrated Transport and Land use – To focus growth along existing and proposed high quality public transport corridors and nodes on the expanding public transport network and to support the delivery and integration of '**BusConnects**', DART expansion and LUAS extension programmes, and Metro Link, while maintaining the capacity and safety of strategic transport networks* (emphasis added).
>
> *Increased employment density in the right places – To plan for increased employment densities within Dublin City and suburbs and at other sustainable locations near high quality public transport nodes, near third level institutes and existing employment hubs, and to relocate less intensive employment uses outside the M50 ring and existing built-up areas.*
>
> *Alignment of growth with enabling infrastructure – To promote quality infrastructure provision and capacity improvement, in tandem with new development and aligned with national projects and improvements in water and wastewater, sustainable energy, waste management and resource efficiency.*

Metropolitan Scale Amenities – To enhance provision of regional parks and strategic Green Infrastructure, to develop an integrated network of metropolitan scale amenities, and to develop greenways/blueways along the canals, rivers and coast, as part of the implementation of the National Transport Authority's Cycle Network Plan for the Greater Dublin Area.'

A number of RPOs are relevant to the Proposed Scheme:

'RPO 5.2: Support the delivery of key sustainable transport projects including Metrolink, DART and LUAS expansion programmes, BusConnects and the Greater Dublin Metropolitan Cycle Network and ensure that future development maximises the efficiency and protects the strategic capacity of the metropolitan area transport network, existing and planned'.

'RPO 5.3: Future development in the Dublin Metropolitan Area shall be planned and designed in a manner that facilitates sustainable travel patterns, with a particular focus on increasing the share of active modes (walking and cycling) and public transport use and creating a safe attractive street environment for pedestrians and cyclists.'

'RPO 5.6: The development of future employment lands in the Dublin Metropolitan Area shall follow a sequential approach, with a focus on the re-intensification of employment lands within the M50 and at selected strategic development areas and provision of appropriate employment densities in tandem with the provision of high-quality public transport corridors.'

'RPO 5.8: Support the promotion and development of greenway infrastructure and facilities in the Dublin metropolitan area and to support the expansion and connections between key strategic cycle routes and greenways as set out in the NTA Greater Dublin Area Cycle Network Plan.

The Dublin MASP sets out a list of key transport infrastructure investments in the metropolitan area as supported by National policy.

'RPO 8.7: To promote the use of mobility management and travel plans to bring about behaviour change and more sustainable transport use'.

'RPO 8.9: The RSES supports delivery of the bus projects set out in Table 8.3 subject to the outcome of appropriate environmental assessment and the planning process'.

The bus projects include:

- *'Core Bus Corridors comprising 16 radial routes and 3 orbital routes in Dublin'*;
- '*Regional Bus Corridors connecting the major regional settlements to Dublin'*; and
- '*Improvements to bus waiting facilities.*'

The cycling objectives include:

- *'Delivery of the cycle network set out in the NTA Greater Dublin Area Cycle Network Plan inclusive of key commuter routes and urban greenways on the canal, river and coastal corridors'*;
- *'Investment priorities for cycleways feasibility and route selection studies for cycleways shall identify and subsequently avoid high sensitivity feeding or nesting points for birds and other sensitive fauna'*; and
- *'Delivery of the National Cycle Plan within the Region inclusive of the Greenway and Blueway projects*.'

3.6.4.1 Proposed Scheme Response

The Proposed Scheme is supported by the RSES. BusConnects (of which the Proposed Scheme is a part) is identified as a key infrastructure project to deliver on the principles of Healthy Placemaking, Climate Action and Economic Opportunity, which will support the regional growth strategy for the Eastern and Midlands Region including the Dublin MASP area. The Proposed Scheme will support continued improved integration of transport

with land use planning. The delivery of improved high-capacity Core Bus Corridors will enable and support the delivery of both residential and economic development opportunities, facilitating the sustainable growth of Dublin City and its metropolitan area. The dedicated bus lanes proposed will significantly increase bus travel speeds and reliability while the cycle lane infrastructure will promote modal shift from private car to a more sustainable forms of transport. The RSES not only seeks an improved and enhanced bus network but also places cycling at the core of its transport objectives.

3.6.5 Greater Dublin Area Cycle Network Plan (GDACNP) 2013

The NTA's GDACNP 2013 (NTA 2013) is a Regional level plan for an integrated cycle network across the seven Local Authorities comprising the GDA. It includes an Urban Network, Inter-Urban Network, and a Green Route Network for the GDA. A SEA and AA were carried out as part of the GDACNP. The context for the GDACNP is given as '*The Irish Government, the NTA and various State Agencies are committed to ensuring that cycling as a transport mode is supported, enhanced and exploited, in order to achieve strategic objectives and reach national goals*.'

The following are the networks identified in the GDACNP:

- '*The Urban Cycle Network at the Primary, Secondary and Feeder Level*':
  - '*Primary corridors are the main cycle arteries that cross urban area and carry most of the traffic;*
  - *Secondary corridors links between the principal cycle routes and local zones; and*
  - *Feeder corridors are connections from zones to the network levels above and / or cycle routes within local zones.*'
- '*The Inter-Urban Cycle Network linking the relevant sections of the Urban Network and including the elements of the National Cycle Network within the GDA. It shall also include linkages to key transport locations outside of urban areas such as airports and port'*; and
- '*The Green Route Network being cycle routes developed predominately for tourist, recreational and leisure purposes*.'

There are primary (Routes 6, SO5) and secondary (Routes SO4, SO6, NO5) cycle routes identified along the Proposed Scheme. The route also interchanges with the Liffey Greenway and N06 Greenway.

3.6.5.1 Proposed Scheme Response

The Proposed Scheme is supported by the GDACNP as it will provide infrastructure that will support and enhance cycling as a transport mode, including the delivery of infrastructure for specific routes identified as part of the cycle network plan.

3.6.6 Draft Greater Dublin Area Cycle Network Plan 2021

The Draft GDA Cycle Network Plan (NTA 2021b) is a Regional level plan for an integrated cycle network across the GDA. The Draft Plan is an update to the 2013 GDA Cycle Network Plan. The 2013 Plan sought to identify the links needed to provide for an adequate cycling network. The Draft Plan aims to strengthen access and local permeability and offer greater cycling connectivity between Dublin and GDA Towns.

The vision of the plan is set out, as follows:

> *'The Greater Dublin Area Cycle Network seeks to be an inclusive cycling environment that is safe for all cycling abilities and ages with strong functional and recreational connectivity between homes and key destinations'*

The main goals of the Draft Plan are:

- *'To increase participation,*
- *Improve safety and accessibility,*

- *Improve connectivity; and*
- *Create a navigable and coherent network.'*

The following are the networks identified and classified in the Draft Plan:

- *'Primary Arterial - Main cycling arterials enabling high levels of utility movements among town centres and Dublin City in a radial manner;*
- *Primary Orbital - Main cycling arterials enabling high levels of utility movements orbitally among Dublin's suburban town centres;*
- *Secondary - Moderately trafficked cycling connections between local zones and other network classifications, and provides resilience to the Primary Networks;*
- *Greenway – Utility - Parkland, coastal or waterway links providing utility functions for commuting, education, community service access and onward transport connections;*
- *Greenway – Leisure - Parkland, coastal or waterway links providing recreational and leisure functions;*
- *Inter Urban - Routes which connect towns and urban centres over longer distances throughout the GDA; and*
- *Feeder - Localised cycling connections providing access among residential areas and local zones as well as providing access onto other classifications.'*

It outlines that projects that may interact / impact with the Draft Plan include BusConnects and comments, as follows:

> *'BusConnects Dublin is a 10-year programme to improve the quality, speed and reliability of bus service in the Dublin area. As part of its delivery 16 Core Bus Corridors (CBCs) are proposed, each with segregated cycle track and/or tracks. A limited number of quiet routes for cycling are proposed in parallel to some sections of the CBCs'.*

3.6.6.1 Proposed Scheme Response

The Draft Plan is subject to change, however, it demonstrates a further commitment by the NTA to provide an enhanced cycle network within the GDA. BusConnects Dublin, of which the Proposed Scheme forms part, will deliver the infrastructure necessary to expand and enhance the cycle network in line with the objectives of the Draft Plan.

3.7 Local Policy Context

The Proposed Scheme is located within two local authority areas, South Dublin County Council (SDCC) and Dublin City Council (DCC). The Proposed Scheme will be within SDCC from where commences at the N4 Junction 3 to the Lucan Road slip road. The remainder of the Proposed Scheme is within DCC.

3.7.1 South Dublin County Council Development Plan (SDCCDP) 2016 - 2022

The South Dublin County Council Development Plan 2016 – 2022 (hereafter referred to as the SDCCDP) (SDCC 2016) was the statutory plan for the functional area of South Dublin County Council until the adoption of new 2022 – 2028 Development Plan (See Section 3.7.2) which was adopted on 3rd August 2022 but is subject to further amendments following a Ministerial Direction. This report includes a brief overview of some of the key transport related policies of the SDCCDP 2016 as, at the time of writing, it has only recently been superseded and to show the Proposed Schemes compliance with both Development Plans.

The SDCCDP sets the strategy for proper planning and sustainable development of South Dublin County. A SEA, AA, FRA and NIS were produced as part of the plan. The overarching considerations of the plan are quality of life, prosperity, sustainability, health and wellbeing, social inclusion, and climate change adaptation. The transport element of the strategy states that:

> *'The Transport Strategy for South Dublin County seeks to ensure an integrated strategy for transport and mobility that enhances access and movement within and through the County, while promoting change, in favour of sustainable modes. The strategy addresses all types of traffic including pedestrian, cyclist, public transport, private vehicle and economic through traffic. The settlement, employment and transport strategies are aligned with the aim of strengthening the integration between employment, population and transport services.'*

The key policies are set out below in Table 3.9.

Table 3.9: SDCC Transport Policies and Objectives

Transport Policies	How the Proposed Scheme meets the Policy
TM1 Objective 1: *To support and guide national agencies in delivering major improvements to the transport network.*	The Proposed Scheme is being promoted by the NTA as a 'national agency' and it will provide the infrastructure necessary to support enhanced public transport/active travel options along the scheme corridor. The Proposed Scheme is a 'major improvement to the transport network' and as such it should be supported by SDCC.
TM1 Objective 2: *To spatially arrange activities around, and improve access to, existing and planned public transport infrastructure and services*	The Proposed Scheme aligns with the objective as along the route, improvements and enhancements will be made to footpaths, walkways, and pedestrian crossings. The Proposed Scheme provides the infrastructure necessary to support the delivery of sustainable transport and active travel options that will benefit the entire community in terms of greater accessibility, capacity and speed of service improvements. Bus stops have also been carefully designed to incorporate cycle parking, where practicable, providing an integrated sustainable solution for combining active travel with longer distance trips by bus
TM1 Objective 3: *To focus on improvements to the local road and street network that will better utilise existing road space and encourage a transition towards more sustainable modes of transport, while also ensuring sufficient road capacity exists for the residual proportion of the trips which will continue to be taken by private vehicle.*	The Proposed Scheme aligns with the objective as it will provide the infrastructure to deliver a modal shift from private car usage to sustainable transport. It will reduce bus journey times which will in turn reduce fuel usage and it will promote active travel through enhanced cycle and pedestrian infrastructure. The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor.
TM1 Objective 5:	The Proposed Scheme aligns with the objective as it will promote modal shift from private car to more sustainable forms of transport.

Transport Policies	How the Proposed Scheme meets the Policy
To balance the needs of road users and the local community with the need to support the development of a sustainable transportation network.	It enhances active travel networks and thus encourages the use of these modes reducing reliance on the private car.
TM1 Objective 6: *To support the delivery of sufficient public transport and road capacity to facilitate sustainable new development in the County.*	The Proposed Scheme aligns with the objective as it provides infrastructure to support the delivery of sustainable transport that will benefit the entire community in terms of greater accessibility, capacity and speed of service improvements. It will provide improved travel times combined with increased services which will promote an efficient, reliable and frequent public transport service. The Proposed Scheme will facilitate the sustainable growth of Dublin in delivering the transport infrastructure necessary to provide a bus network that supports a growing city.
TM Policy 2: *It is the policy of the council to promote the sustainable development of the County by supporting and guiding national agencies in delivering major improvements to the public transport network and to ensure existing and planned public transport services provide an attractive and convenient alternative to the car.'*	The Proposed Scheme aligns with the objective as the BusConnects Dublin Programme is the National Transport Authority's programme to greatly improve bus services in the Greater Dublin Area of which the Proposed Scheme is part of. The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor.
TM Policy 3: *It is the policy of the Council to re-balance movement priorities towards more sustainable modes of transportation by prioritising the development of walking and cycling facilities within a safe and traffic calmed street environment.'*	The Proposed Scheme aligns with the objective as it will provide the advantage of safe segregated cycling facilities along the route in both directions. These high-quality cycle lanes help to reduce dependency on private car use for short journeys. Along the route, improvements and enhancements will be made to footpaths, walkways and pedestrian crossings as well as urban realm and landscape improvements.
TM Objective 3: *'To ensure that all streets and street networks are designed to prioritise the movement of pedestrians and cyclists within a safe and comfortable environment for a wide range of ages, abilities and journey types'.*	The Proposed Scheme aligns with the objective as it has been designed to include: More bus shelters, seating, accessible footways and bus infrastructure to make travel by bus more accessible for users of all abilities and ages. Provision and enhancement of cycling facilities along the Proposed Scheme, creates routes that are safe, accessible and attractive for people of all abilities and ages.

In addition to the above, it is clear that SDCC has an important role in facilitating improvements to public transport and the bus network in particular. It is an action of Policy 2 for SDCC to:

> '*work with the NTA to secure the extension and expansion of the Core Bus Network and other bus services to serve new areas of employment, housing and tourism potential, whilst also improving the efficiency and frequency of services within more established areas.'*

3.7.1.1 Proposed Scheme Response

The Proposed Scheme complies with the objectives of the SDCCP (SDCC 2016) outlined in Table 3.9 above. The Proposed Scheme will deliver a major improvement in the transport network as it will provide the infrastructure necessary to facilitate more sustainable modes of transport including bus, cycling and walking. The Proposed Scheme has been designed to improve safety and comfort for a range of ages, abilities and journey types. It is also noted that SDCC will work with the NTA to '*secure the extension and expansion of the Core Bus Network'* of which the Proposed Scheme forms part.

3.7.1.2 Zoning Objectives

The SDCCDP sets out an extensive number of policies and objectives relevant to the Proposed Scheme. Those policies considered relevant to the Proposed Scheme are set out in Table 1.1 in Appendix 1 (Local Policy) of this Report.

The SDCCDP establishes a number of zoning objectives to regulate and manage future land uses. The Proposed Scheme will pass through lands subject to zoning objectives, these are set out in Table 1.2 in Appendix 1 (Local Policy) of this Report.

Other Uses

'Uses that have not been listed under the land use zoning tables will be considered on a case-by-case basis in relation to conformity with the relevant policies, objectives and standards contained within the Plan, particularly in relation to the zoning objective of the subject site and its impact on the development of the County at a strategic and local level'

Public Service Installations

The SDCDP defines a public service installation as *'A building or part there of or land used for the provision of public services. Public services include all service installations necessarily required by electricity, gas, telephone, radio, telecommunications, television, drainage and other statutory undertakers, it includes public lavatories, public telephone boxes, bus shelters, bring centres, green waste and composting facilities.'*

As defined above, the secondary elements associated with the Proposed Scheme such as bus shelters, stops and real time information signage comes within the public service installation class.

3.7.1.3 Proposed Scheme Response

Given the nature of the Proposed Scheme the majority of the proposed works are within the public road and pavement area where there is no specific zoning objective. On lands subject to zoning objectives that are affected by works, in general, the Proposed Scheme will not significantly impact upon the principal use of the zoning objective. However, there may be instances of temporary or limited impacts upon a given zoning objective, such as in the case of reinstating open space lands. The Proposed Scheme complies with the SDCCDP in terms of the uses and works proposed in principle.

3.7.1.4 Local Area Plans within the SDCC Area Relevant to the Proposed Scheme

The following adopted Local Area Plans (LAPs) are relevant to the Proposed Scheme. The Liffey Valley LAP (SDCC 2008) was published in 2008 and extended to 2018. While it has expired, the policies and objectives within the Liffey Valley LAP are still relevant to the Proposed Scheme.

Table 3.10: SDCC LAPs

LAP	Reference / Section	Objective	Scheme Response
Liffey Valley 2008	Bus Services	• *Increase the service frequency of bus services calling directly at the Liffey Valley site;* • *Improve on site bus infrastructure, to include high quality waiting areas, real time information, disabled access and improved interchange facilities at the Liffey Valley site for buses and taxi's*	The Proposed Scheme aligns with the objective as it will provide improved travel times combined with increased services that will promote an efficient, reliable and frequent public transport service.
	Aspirations	• *Clearly defined and high quality links that provide direct access between destinations.*	The Proposed Scheme aligns with the objective as it will provide improved travel times combined with increased services that will promote an efficient,

LAP	Reference / Section	Objective	Scheme Response
		• *A street network that provides a greater balance between the needs of pedestrians, public transport and private vehicles.* • *The emergence of a Public Transport hub at the Town Centre, which links into the emerging public transport network*	reliable and frequent public transport service.

3.7.1.5 Proposed Scheme Response

At a strategic level the SDCCDP supports an integrated transport network that offers enhanced access and mobility throughout the county. The Development Plan also sets out an extensive number of policies and objectives relevant to the Proposed Scheme. These are set out in Table 1.1 in Appendix 1 (Local Policy). Furthermore, the Proposed Scheme will improve sustainable transport infrastructure within the immediate area of the LAP which will improve general accessibility to the LAP lands and further enhance the bus, cycling and pedestrian network in the area

3.7.2 SDCC Development Plan 2022 – 2028

The South Dublin County Council Development Plan 2022-2028 (hereafter referred to as the SDCCDP 2022-2028) (SDCC 2022) sets the strategy for the proper planning and sustainable development of South Dublin County. A SEA, AA, FRA and NIS were produced as part of the plan. All aspects of the development plan were adopted on the 3rd August 2022 with the exception of two sections which are subject to a Ministerial Direction by the Minister of State at the Department of Housing, Local Government and Heritage, the sections are as follows;

- *'Omit the Enterprise and Employment zoning and the specific local objective which requires site-specific flood alleviation measures introduced as Material Amendments 2.20 and 9.4 from the lands to the 2 north and east of the existing Greenogue Business Park and retain the Rural RU zoning objective.'*

- '*Amend the land use zoning objectives in tables 13.4, 13.8 and 13.10 to reinstate data centre use class as an 'open for consideration' use class in the REGEN, Enterprise & Employment (EE) and Major Retail Centre (MRC) zoning objectives.'*

At the time of writing, the above parts of the Plan have not come into effect. Observations in respect of the Draft Ministerial Direction were made to the council for a period of 2 weeks from 10th August 2022 to 23rd August 2022. Observations submitted during this time will be considered by the Office of the Planning Regulator before it makes its recommendation to the Minister. At the time of writing, the minister's decision is expected by the end of 2022.

Those parts of the SDCCDP 2022-2028 (as outlined above) which are due to be amended do not materially have an impact on the Proposed Scheme. The plan includes '*a vision for the County's growing communities, places, housing, jobs, sustainable transport and the delivery of services in a manner which promotes climate action and efficient patterns of land use, paying particular attention to the physical, cultural, environmental and social identities that define areas within the County and support their ongoing evolution and integration with each other*'. The transport element of the Strategy sets out that it seeks to:

> *'rebalance transport and mobility within the County by promoting ease of movement by sustainable modes (including walking, cycling and public transport). This will provide for the freeing up of road space for essential functions such as, public transport and emergency vehicles. It will also allow for commercial transport which is essential to economic growth. In doing so, the Council will continue to provide for all elements of the transportation network that are within its remit and will engage with external agencies including the National Transport Authority (NTA) and Transport Infrastructure Ireland (TII) to assist the delivery of sustainable transport projects that are provided at a regional or national level'.*

In addition to the above, it is clear that SDCC has recognised the importance of BusConnects to improving transport and movement within SDCC, as outlined under the heading 'Travel Mode Share':

'*Transition to public transport will be aided by improvements in the pipeline including the roll-out of BusConnects which will include proposals for six new dedicated bus routes through the County. BusConnects will provide a redesigned more efficient bus network with high frequency spines, new orbital routes and increased bus services.*'

Furthermore, the SDCCDP 2022-2028 identifies BusConnects as a strategic project '*that will have the potential over the coming years to have a transformative impact on travel by shifting the dominance of car-based transport towards public transport*'.

The key policies are set out below in **Table 3.11**.

Table 3.11: SDCC Transport Policies and Objectives

Transport Policies	How the Proposed Scheme meets the Policy
Policy SM1: Overarching – Transport and Movement: *'Promote ease of movement within, and access to South Dublin County, by integrating sustainable land-use planning with a high-quality sustainable transport and movement network for people and goods'.*	The Proposed Scheme will promote the ease of movement within and throughout South Dublin County through the provision of improved bus services and enhanced opportunities for walking and cycling. The Proposed Scheme promotes sustainable transport and movement network through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor. The Proposed Scheme is therefore compliant with Policy SM1.
SM1 Objective 1: *'To achieve and monitor a transition to more sustainable travel modes including walking, cycling and public transport over the lifetime of the County Development Plan, in line with the County mode share targets of 15% Walk; 10% Cycle; 20% Bus; 5% Rail; and 50% Private (Car/Van/HGV/Motorcycle)'.*	The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor. The Proposed Scheme will support the mode share targets as outlined.
SM1 Objective 2: *To ensure consistency with the NTA's Transport Strategy for the Greater Dublin Area (2016-2035) and any superseding document, as required by RPO 8.4 of the RSES.*	The Proposed Scheme is being promoted by the NTA as part of the BusConnects Dublin Programme and has considered the NTA's Transport Strategy for the Greater Dublin Area (2016-2035) as part of its development. The Proposed Scheme therefore compliant with Policy SM1 Objective 2 in accordance with RPO 8.4 of the RSES.
SM1 Objective 3: *To support the delivery of key sustainable transport projects including DART and Luas expansion programmes, BusConnects and the Greater Dublin Metropolitan Cycle Network in accordance with RPO 5.2 of the RSES/MASP.*	The Proposed Scheme is being promoted by the NTA as part of the BusConnects Dublin Programme and is therefore compliant with Policy SM1 Objective 3 in accordance with RPO 5.2 of the RSES / MASP.
SM1 Objective 4: *To ensure that future development is planned and designed in a manner that facilitates sustainable travel patterns, with a particular focus on increasing the share of active modes (walking and cycling) and public transport use and creating a safe and attractive street environment for pedestrians and cyclists, in accordance with RPO 5.3 of the RSES/MASP.*	The Proposed Scheme aligns with the objective as it will provide the infrastructure to deliver a modal shift from private car usage to sustainable transport including walking, cycling and public transport. The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor. The Proposed Scheme will be designed to create a safe and attractive street environment with improvements and enhancements to footpaths, walkways, and pedestrian crossings. The Proposed Scheme is therefore compliant with RPO 5.3 of the RSES / MASP.
SM1 Objective 5: *To ensure that future development is planned and designed in a manner that maximises the efficiency and protects the strategic capacity of the metropolitan area transport network,*	The Proposed Scheme aligns with this objective as it is designed to provide a better, more reliable and more efficient bus service for everyone in compliance with RPO 8.3 of the RSES. The Proposed Scheme will support the creation of an attractive, resilient, equitable public transport network better connecting

Transport Policies	How the Proposed Scheme meets the Policy
both existing and planned, and to protect and maintain regional accessibility, in accordance with RPO 8.3 of the RSES.	communities and improving access to work, education and social activity. The Proposed Scheme will bring greater accessibility to the City Centre and better connect communities and locations along its route for people to avail of housing, jobs, amenities and services.
SM1 Objective 6: *To safeguard the County's strategic road network and to improve the local road and street network in a manner that will better utilise existing road space and encourage a transition towards more sustainable modes of transport.*	The Proposed Scheme aligns with this objective as it will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor.
SM1 Objective 7: *To engage with relevant agencies including the National Transport Authority (NTA) and Transport Infrastructure Ireland (TII) in relation to strategic and local transportation issues including delivery of transport projects and to encourage consultation with local communities.*	The Proposed Scheme is being promoted by the NTA as part of the BusConnects Dublin Programme which seeks to address strategic transportation issues in the County. Extensive Non-Statutory Public Consultation on the Proposed Scheme has been undertaken. The Proposed Scheme is therefore compliant with Policy SM1 Objective 7.
Policy SM2: Walking and Cycling *'Re-balance movement priorities towards sustainable modes of travel by prioritising the development of walking and cycling facilities and encouraging a shift to active travel for people of all ages and abilities, in line with the County targets'.*	The Proposed Scheme aligns with the objective as it will provide the infrastructure to deliver a modal shift from private car usage to sustainable transport including walking, cycling and public transport. The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor. The Proposed Scheme will be designed to meet the needs and abilities of all users.
Policy SM3: Public Transport – General *'Promote a significant shift from car-based travel to public transport in line with County targets and facilitate the sustainable development of the County by supporting and guiding national agencies in delivering major improvements to the public transport network'.*	The Proposed Scheme aligns with the objective as it will provide the infrastructure to deliver a modal shift from private car usage to sustainable transport. The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services that will use the corridor.
SM3 Objective 2: *'To facilitate and secure the implementation of major public transport projects as identified within the NTA Transport Strategy for the Greater Dublin Area (2016-2035), or any superseding document, including BusConnects, the DART expansion programme along the Kildare route, the opening of the new rail station at Kishogue and the Luas to Lucan'.*	The Proposed Scheme is being promoted by the NTA as part of the BusConnects Dublin Programme and is therefore compliant with Policy SM3 Objective 2.
Policy SM3: Public Transport – Bus *SM3 Objective 11:* *'To facilitate the delivery of the BusConnects Core Bus Corridors and seek additional bus corridor and orbital routes to serve the County by securing and maintaining any required route reservations and to ensure the BusConnects Corridors do not adversely affect the village life and livelihoods of any of our County Villages'.*	The Proposed Scheme is being promoted by the NTA as part of the BusConnects Dublin Programme and will seek additional and improved bus corridors to serve the County whilst protecting the village life and livelihoods of the County's villages. The Proposed Scheme is therefore compliant with Policy SM3 Objective 11.

Transport Policies	How the Proposed Scheme meets the Policy
'SM3 Objective 12: *To work with the NTA to secure the expansion of the bus network to serve new development and regeneration areas within the South Dublin County area including Tallaght, Naas Road, Adamstown, Clonburris, Fortunestown, Ballycullen and Newcastle'.*	The Proposed Scheme is being promoted by the NTA as part of the BusConnects Dublin Programme and it will provide the infrastructure necessary to support enhanced public transport / active travel options along the scheme corridor. The Proposed Scheme is a 'major improvement to the transport network' and as such it should be supported by SDCC.

In addition to the above, it further comments under the heading 'Transport Interchanges' that:

> *'Multi-modal transport interchanges increase the efficiency and flow of public transport services. A public square and transport interchange is proposed for Tallaght Town Centre, that would provide a first-class interchange between the Luas, BusConnects, taxi, cycling and walking'*.

The SDCCDP 2022-2028 sets out an extensive number of other policies and objectives relevant to the Proposed Scheme. Those policies considered relevant to the Proposed Scheme are set out in Table 1.3 in Appendix 1 (Local Policy) of this Report.

3.7.2.1 Proposed Scheme Response

At a strategic level, the SDCCDP 2022-2028 supports an integrated transport network that offers enhanced access and mobility throughout the county. The Proposed Scheme will help to deliver the infrastructure required to facilitate the 'integrated transport network' sought by the SDCCDP 2022-2028. In addition to the above, the extensive number of policies and objectives relevant to the Proposed Scheme and its compliance with same has been set out in Table 1.3 in Appendix 1 (Local Policy) of this Report.

3.7.3 SDCC Climate Change Action Plan 2019-2024

SDCC's Climate Change Action Plan was adopted in 2019, it was a collaborative response to the impact that climate change is having on the Dublin Region. The SDCC plan is unique to its functional area. A SEA, AA and NIS were prepared as part of the plan. The plan covers five key areas - Energy and Buildings, Transport, Flood Resilience, Nature-Based Solutions and Resource Management – and sets out 130 actions across the key areas. The four main targets of the plan are:

1. *33% better energy use by the Council by 2020;*
2. *40% reduction in the Council's greenhouse gas emissions by 2030;*
3. *To make Dublin a climate resilient region, by reducing the impacts of future (and current) climate change-related events; and*
4. *To actively engage and inform citizens on climate change.*

The SDCC Climate Change Action Plan focuses on the sustainable transport measure to reduce pollutants and to achieve modal shift from private car to public transport. The main transport specific actions related to the Proposed Scheme are:

- *'T11 Build out County Cycle Network';*
- *'T12 Development of cycle/ pedestrian greenways';*
- *'T15 SDCC will continue to seek new and expand on existing partnerships to encourage sustainable travel and safer travel behaviours.'; and*
- *'T18 Facilitate the delivery of public transport routes'.*

It is also noted that under the heading 'Air pollution and air quality adaptation actions' that actions adopted by South Dublin Council include: (inter alia) 'Transport policies to reduce pollutants. This includes the provision of cycle routes, and the expansion of Quality Bus Corridors (QBCs) and increased park and ride facilities'.

3.7.3.1 Proposed Scheme Response

The Proposed Scheme through the provision of enhanced public transport infrastructure will help to achieve SDCC's targets as set out in the Climate Action Plan.

3.7.4 Dublin City Development Plan 2016 - 2022

The Dublin City Development Plan 2016 - 2022 (hereafter referred to as the DCDP) (DCC 2016a) guides the future growth and development of the functional area of DCC. A SEA, AA and Strategic Flood Risk Assessment (SFRA) were carried out as part of the DCDP.

The vision of the DCDP is to champion compact city living, distinct character, a vibrant culture, and a diverse, smart, green, innovation-based economy. In the longer term (25 to 30 years), DCC aims to establish the City as one of Europe's most sustainable, dynamic, and resourceful city regions. The DCDP places sustainable transport as a core principle in the future development of the city.

> *'Within the next 25 to 30 years, Dublin will have an established international reputation as one of Europe's most sustainable, dynamic and resourceful city regions. Dublin, through the shared vision of its citizens and civic leaders, will be a beautiful, compact city, with a distinct character, a vibrant culture, and a diverse, smart, green, innovation-based economy. It will be a socially inclusive city of urban neighbourhoods, all connected by an exemplary public transport, cycling and walking system and interwoven with a quality bio-diverse green space network. In short, the vision is for a capital city where people will seek to live, work, experience, invest and socialise, as a matter of choice.'* (Emphasis added.)

In 'Translating the Core Strategy into Development Plan Policies and Objectives', the core strategy has the following supports:

> *'Dublin City Council will work with the emerging strategy of the National Transport Authority and supplement it with supporting local improvements, particularly to the city centre environment through the implementation of the public realm strategy and locally focused objectives.'*

The DCDP recognises that increasing capacity on public transport including bus corridors is a means to promoting modal change and active travel.

Within the transport objectives of the DCDP, bus improvements are identified as projects to be supported. The key policies are set out in Table 3.12.

Table 3.12: Dublin City Development Plan 2016-2022

Transport Policies (relevant to Bus Improvements) Transport Policies	How the Proposed Scheme meets the Policy
'MT3: To support and facilitate the development of an integrated public transport network with efficient interchange between transport mode, serving the existing and future needs of the city in association with relevant transport providers, agencies and stakeholders.'	The Proposed Scheme aligns with the objective as it will enhance the interchange between the various modes of public transport operating in the city and wider metropolitan area, both now and in the future. The design has been developed with this in mind and, in so far as possible, is seeking to provide for improved existing or new interchange opportunities with other transport services. BusConnects Dublin Programme is the National Transport Authority's programme to greatly improve bus services in the Greater Dublin Area of which the Proposed Scheme is part.
'MT4: To promote and facilitate the provision of Metro, all heavy elements of the DART Expansion Programme including DART Underground (rail interconnector), the electrification of existing lines, the expansion of Luas, and improvements to the bus network in order to achieve strategic transport objectives.'	The Proposed Scheme aligns with the objective as it will improve the Bus Network along the scheme corridor.

Transport Policies (relevant to Bus Improvements) Transport Policies	How the Proposed Scheme meets the Policy
'MT04: To support improvements to the city's bus network and related services to encourage greater usage of public transport in accordance with the objectives of the NTA's strategy and the governments 'Smarter Travel' document.'	The Proposed Scheme aligns with the objective as BusConnects Dublin Programme is the National Transport Authority's programme to greatly improve bus services in the Greater Dublin Area of which the Proposed Scheme is part. It will support the objectives in the Smarter Travel document by providing improvements to pedestrian and cycle amenities along the proposed route.
'MT05 (i): 'To facilitate and support measures proposed by transport agencies to enhance capacity on existing public transport lines and services, to provide/improve interchange facilities and provide new infrastructure.'	The Proposed Scheme aligns with the objective as BusConnects Dublin Programme is the National Transport Authority's programme to greatly improve bus services in the Greater Dublin Area.
'MT11: To continue to promote improved permeability for both cyclists and pedestrians in existing urban areas in line with the National Transport Authority's document 'Permeability – a best practice guide.'	The Proposed Scheme aligns with the objective as Chapter 6 (Traffic & Transport) of the EIAR has considered permeability as part of the project.
MT20: To increase capacity of public transport, cycling and walking, where required, in order to achieve sustainable transportation policy objectives. Any works undertaken will include as an objective, enhanced provision for safety, public transportation, cyclists and pedestrians, and will be subject to environmental and conservation considerations.	The Proposed Scheme aligns with the objective as it will provide the infrastructure required to increase the capacity of bus, cycle and pedestrian networks along the Proposed Scheme corridor. Furthermore, the Proposed Scheme provides enhanced safety through the provision of segregated cycling facilities.

3.7.4.1 Proposed Scheme Response

The Proposed Scheme will deliver the infrastructure necessary to enhance public transport, walking and cycling networks along the route corridor. It will facilitate a modal shift towards public transport and active travel modes which is a key objective of the DCDP

3.7.4.2 Zoning Objectives

The DCDP (DCC 2016) establishes a number of zoning objectives to regulate and manage future land uses within the city council area. The DCC zoning objectives have been set out in Table 2.2 of Appendix 1 (Local Policy) of this Report.

Within the DCDP, the following approach is taken by DCC to the uses permitted under each of the zoning objectives.

> *'14.4 Permissible and Non-Permissible Uses*
>
> *A permissible use is one which is generally acceptable in principle in the relevant zone, but which is subject to normal planning consideration, including policies and objectives outlined in the plan. An open for consideration use is one which may be permitted where the planning authority is satisfied that the proposed development would be compatible with the overall policies and objectives for the zone, would not have undesirable effects on the permitted uses, and would otherwise be consistent with the proper planning and sustainable development of the area.'*

Appendix 21 of the DCDP defines a 'Public Service Installation' as follows:

> '*A building, or part thereof, a roadway or land used for the provision of public services. Public services include all service installations necessary for electricity, gas, telephone, radio, telecommunications, television, data transmission, drainage, including wastewater treatment plants and other statutory undertakers: bring centres, green waste composting centres, public libraries, public lavatories, public telephone boxes, bus shelters, etc. but does not include incinerators/waste to energy plants. The offices of such undertakers and companies involved in service installations are not included in this definition.'*

As defined above, the secondary elements associated with the Proposed Scheme such as bus shelters, stops and real time information signage comes within the public service installation class.

3.7.4.3 Proposed Scheme Response

Given the nature of the Proposed Scheme the majority of the proposed works are within the public road and pavement area where there is no specific zoning objective. On lands subject to a zoning objective that are affected by works, in general, the Proposed Scheme will not significantly impact upon the principal use of the zoning objective. However, there may be instances of temporary or limited impacts upon a given zoning objective, such as in the case of temporary construction compound use on open space / amenity zoned lands The Proposed Scheme complies with the DCDP in terms of the uses and works proposed in principle.

3.7.4.4 LAPs within the Dublin City Council Area Relevant to the Proposed Scheme

The Proposed Scheme is within the Liberties LAP 2009 (DCC 2009); however it is limited to a very small section of Victoria Quay to the front of Heuston Train Station.

Table 3.13: DCC LAPs

LAP	Reference / Section	Objective	Scheme Response
Liberties LAP 2009	1.2 Overarching Aims Objective 8	*To promote the principles of good urban design including improving connectivity and enhancing the legibility and permeability of the Liberties in relation to the wider cityscape.*	The Proposed Scheme will facilitate this objective by providing the infrastructure to improve connectivity, legibility and permeability for bus, cycling and walking.
	1.2 Overarching Aims Objective 10	*To promote sustainable modes of transport by making them convenient and attractive including walking and cycling routes and by facilitating the provision of public transport infrastructure and optimising its use*	The Proposed Scheme will facilitate this objective by providing sustainable modes of transport through new infrastructure for walking, cycling and public transport.

The Major City Quarters figure notes the area adjacent to Heuston Station as a '*Potential High Intensity Cluster*'.

3.7.4.5 Proposed Scheme Response

At a strategic level, the DCDP (DCC 2016) supports an integrated transport network that offers a greater choice of public transport and active travel. The DCDP also sets out an extensive number of policies and objectives relevant to the Proposed Scheme. These are set out in Table 2.1 in Appendix 1 (Local Policy).

3.7.4.6 The Heart of Dublin – City Centre Public Realm Masterplan 2016

The Heart of Dublin – City Centre Public Realm Masterplan (DCC 2016) for Dublin City Centre was published by DCC in 2016. The overall vision is one of a pedestrian friendly core within the City Centre, so that the city can be easy, comfortable, and enjoyable to move within, the strategy will require the full completion of the planned public transport network. The Proposed Scheme is limited to a very small section of the masterplan area along the public road of Victoria Quay, near Heuston Station which is zoned as 'Phase III Public Realm Projects'.

3.7.4.7 Proposed Scheme Response

The Landscape and Urban Realm proposals for the Proposed Scheme are based on an urban context and landscape character analysis of the route. The proposals have been informed through discussions with the NTA, local authorities and stakeholders. The overall landscape and public realm design strategy for the route aims to create attractive, consistent, functional and accessible places for people alongside the bus and cycle facilities. It aims to mitigate any adverse effects that the proposals may have on the streets, spaces, local areas and landscape through the use of appropriate design responses. In addition, opportunities have been sought to enhance the public realm and landscape design where possible. In the context of the above, the Proposed Scheme is therefore compliant with the Heart of Dublin – City Centre Public Realm Masterplan (DCC 2016).

A comprehensive Tree Survey was conducted which analysed the quality and character of the existing trees along the Proposed Scheme. The information from the survey used to inform the design proposals by seeking to avoid the higher quality trees and identifying measures which will be put in place during detailed design and construction to mitigate potential effects on the trees.

3.7.4.8 Your City Your Space – Dublin City Public Realm Strategy 2012

The Your City Your Space – Dublin City Public Realm Strategy (DCC 2012) was published in 2012. It seeks to co-ordinate the approach to the public realm and to address its many existing challenges through a series of actions. The Your City Your Space – Dublin City Public Realm Strategy includes part of the Proposed Scheme at the junction of Saint John's Road West and South Circular Road which is classed as N & S Circular Roads, Military Road which is classed as Future / Enhanced Connections, Victoria Quay is classed as a Civic Spine and Liffey Corridor and Steevens Lane which is classed as a Linking Route.

The design principles for these areas are set out in Table 3.14.

Table 3.14 City Centre Public Realm Strategy Design Policies

Public Spaces	Desired Character and Experience	Design Policies
Civic Spine and Liffey Corridor	The Liffey Corridor and the Civic Spine are the most important series of streets and spaces in the city and as such the quality of the public realm is exemplary and of the highest international standard. The public realm is coherent and consistent in design, and constructed using the highest quality materials creating a pleasant environment in which it is easy to move around. A mix of activities are accommodated which make the Civic Spine a key attraction nationally.	The Liffey Corridor will be the subject of an urban design and landscaping proposal to improve the quality of experience. Comprehensive design briefs will be developed to extend the integrated landscape of O'Connell street through the rest of the Civic Spine. Building proposals to enclosures must protect historic character and achieve outstanding quality. An agreed standard of treatment and floral decoration for this important space will be implemented.
Linking Route	These streets are important linking routes in the city and often contain commercial and cultural attractions, as such there is a high quality public realm that is coherent and consistent in design and constructed using high quality materials leading to a pleasant environment, which it is easy to move around in with a mix of activities which make these streets important and interesting linking routes.	Improve the quality of experience by rebalancing pedestrian, cycle and vehicular movement and improve the environment through greening and de-cluttering.
N & S Circular Roads	These major routes are high quality routes for moving around and navigating the inner suburbs.	Building proposals to enclosures must protect historic character and achieve high quality, emphasising the importance of these streets in the neighbourhoods they pass through.
Future / Enhanced Connections	These are proposed improvements to street connections within districts and to destinations.	Where connections exist already the pedestrian environment will be brought up to the standard of other Linking Routes. For future routes Dublin City Council will work with stakeholders to form good quality street connections.

3.7.4.9 Proposed Scheme Response

The Landscape and Urban Realm proposals for the Proposed Scheme are based on an urban context and landscape character analysis of the route. The proposals have been informed through discussions with the NTA, local authorities and stakeholders. The overall landscape and public realm design strategy for the route aims to create attractive, consistent, functional and accessible places for people alongside the bus and cycle facilities. It aims to mitigate any adverse effects that the proposals may have on the streets, spaces, local areas and landscape through the use of appropriate design responses. In addition, opportunities have been sought to enhance the public realm and landscape design where possible. In the context of the above, the Proposed Scheme is therefore compliant with the Your City Your Space – Dublin City Public Realm Strategy.

3.7.5 Draft Dublin City Development Plan 2022 – 2028

At the time of writing, August 2022, Stage 1 (Pre-Draft Stage) and Stage 2 (The Draft Development Plan Written Statement including Appendices) had been completed by DCC and Stage 3 has now commenced. Stage 3 of the development plan making process relates to the proposed material alterations to the Draft Dublin City Development Plan 2022-2028. The proposed material alterations originated from consideration of the submissions received during the public consultation on the display of the draft plan from 29th November to the 14th February 2022. DCC are currently receiving submissions on the proposed material alterations which commenced on 27th July and will conclude on the 1st September 2022.

When the consultation period ends, the Chief Executive will prepare a report on all submissions and observations received and submit the report to the Elected Members by 29th September for their consideration. Having considered the proposed material alterations to the Draft Plan and the Chief Executive's Report on submissions received, the Elected Members will make the Dublin City Development Plan 2022-2028 with or without amendment, at the end of October (date to be confirmed).

Whilst the Board is required to have regard to the Development Plan in force at the date upon which it makes its decision on the application for approval, as opposed to any draft Development Plan, there are a number of aspects of the current Draft Dublin City Development Plan 2022 - 2028 which are of note.

The draft Plan sets out in Chapter 8 (Sustainable Movement and Transport) under the heading 'Introduction' that '*Sustainable and efficient movement of people and goods is crucial for the success and vitality of the city.'* It continues *'The policy approach promotes the integration of land use and transportation, improved public transport and active travel infrastructure, an increased shift towards sustainable modes of travel and an increased focus on public realm and healthy placemaking, while tackling congestion and reducing transport related CO2 emissions*.'

Chapter 8 of the draft Plan further states under the heading 'Sustainable Modes' that '*Key strategic transport projects such as the proposed Metrolink, DART+, BusConnects programme and further LUAS Line and rail construction and extension will continue the expansion of an integrated public transport system for the Dublin region and have the potential for a transformative impact on travel modes over the coming years. Dublin City Council actively supports all measures being implemented or proposed by other transport agencies to enhance capacity on existing lines/services and provide new infrastructure.*'

Chapter 8 of the draft Plan also recognises under the heading 'Challenges' that '*Ireland is committed to cutting it greenhouse gas emissions by at least 51% by 2030 and to achieve this, a significant mode shift to active travel and public transport as well as decarbonised/low carbon mobility is required. Despite a positive shift in the travel behaviours of commuters, congestion and transport related CO2 emissions have continues to rise. One of the significant challenges is the need to enable and foster behavioural change to support continued mode shift to more sustainable options*.'

3.7.5.1 Proposed Scheme Response

The Dublin City Development Plan 2022-2028 is set to be adopted in 2022. Although the draft Dublin City Development Plan 2022-2028 is subject to change, it is clear that BusConnects is an important consideration, and its development is to be considered as part of the shaping of emerging policy for the city.

3.7.6 DCC Climate Change Action Plan 2019-2024

DCC's Climate Change Action Plan was adopted in May 2020. A SEA, AA and NIS were produced as part of the plan. It is a collaborative response to the impact that climate change is having on the Dublin Region, and their commitment to lead by example in tackling this global issue. DCC's Climate Change Action Plan is unique to its functional area and contains 219 actions that cover five key areas – Energy and Buildings, Transport, Flood Resilience, Nature-Based Solutions and Resource Management (waste and water). There are four key targets:

1. *33% better energy use by the Council by 2020.*
2. *40% reduction in the Council's greenhouse gas emissions by 2030.*
3. *To make Dublin a climate resilient region, by reducing the impacts of future (and current) climate change-related events.*
4. *To actively engage and inform citizens on climate change.*

DCC's Climate Change Action Plan focuses on the sustainable transport measure to reduce pollutants and to achieve modal shift from private car to public transport. One of the Public Transport actions number T22 is specifically related to the Proposed Scheme; '*DCC to liaise with NTA on BusConnects programme'*

3.7.6.1 Proposed Scheme Response

The Proposed Scheme through the provision of enhanced public transport infrastructure will help to achieve DCC's targets as set out in the Climate Action Plan.

3.7.7 Heuston Masterplan 2021

In 2021 CIÉ published the Heuston Masterplan, the Heuston Masterplan is a non-statutory plan but has been framed using National and Local development plan policies. The extent of the plan is limited to the Heuston Station site and the Conyngham Road Bus Depot on the north side of the Liffey. Whilst the Proposed Scheme is not within the Masterplan lands it is nonetheless useful to highlight any aims / objectives deemed of relevance to the Proposed Scheme.

The Masterplan sets out potential development options within the masterplan site subject to securing planning and other consents. The key concept of the masterplan is Transport Orientated Development (TOD) which seeks to maximise housing, employment, public service and leisure spaces which are in close proximity to transport nodes. '*In all scenarios the aim is to build on the existing transit connectivity of the lands toward the development of an integrated transport hub that demonstrates an exemplary form of transport orientated development and sustainable, compact, urban growth.'*

The masterplan notes that the site '*will also be a hub of the emerging Bus Connects plan".*

Table 3.15 Connections and Opportunities of the Masterplan

Connections and Opportunities	Proposed Scheme Response
The Heuston Masterplan Area offers the opportunity to build on the significant infrastructural improvements to the St. John's Road Corridor proposed under Bus Connects which will serve to increase activity along this currently neglected frontage.	The Proposed Scheme aligns with the objective as it has ensured that the public realm is carefully considered in the design and development of the transport infrastructure. The Proposed Scheme seeks to enhance key urban focal points where appropriate and feasible. Additional landscaping and outdoor amenities will be provided. Along the route, improvements and enhancements will be made to footpaths, walkways and pedestrian crossings. Crossing points will consist of on-demand signalised pedestrian crossing with appropriate tactile paving, push button units and LED warning studs. Appropriate signage will be used to ensure safe use of facilities by pedestrians.
The Bus Connects proposals will allow a more efficient arrangement and consolidated lay-out for buses, taxis (small public service vehicles) and cycle lanes situated adjacent to the railway station entrance	The Proposed Scheme aligns with the objective as it will provide the advantage of safe segregated cycling facilities along the preferred route in both directions. These high-quality cycle lanes help to reduce dependency on private car use for short journeys. Along the route, improvements and enhancements will be made to footpaths, walkways and pedestrian crossings.

Connections and Opportunities	Proposed Scheme Response
	The Proposed Scheme has been designed to include: More bus shelters, seating, accessible footways and bus infrastructure to make the bus transit experience more accessible for users of all abilities and ages.
The focus will be to limit facilities for private car users as development progresses and as further public transport and active mobility improvements and linkages are delivered	The Proposed Scheme aligns with the objective as it will provide the infrastructure to deliver a modal shift from private car usage to sustainable transport. It will reduce bus journey times which will in turn reduce fuel usage and it will promote active travel through enhanced cycle and pedestrian infrastructure. The Proposed Scheme will support integrated sustainable transport usage through infrastructure improvements for active travel (both walking and cycling), and the provision of enhanced bus priority measures for existing (both public and private) and all future services who will use the corridor.

The Connections & Opportunities: Movement Strategy Options figure highlights three indicative access points onto the R148 Saint Johns Road West. These access points include St Johns Link Road, a connection to Conyngham Road Vehicular Bridge and a connection to Conyngham Road Green Bridge.

3.7.7.1 Proposed Scheme Response

The Proposed Scheme is largely within the existing public road / pavement area. The movement objectives in relation to the provision of an integrated public transport network as well as the promotion of enhanced and expanded cycling and bus facilities will be facilitated by the Proposed Scheme.

4. Proposed Scheme Sections

4.1 Introduction

This section is a review of the land affected by the Proposed Scheme. It summarises the land zonings, development plan map-based objectives and relevant LAPs / Masterplan objectives.

4.2 N4 Junction 3 to M50 Junction 7 – N4 Lucan Road

4.2.1 Zoning

The lands are within the functional area of SDCC and are zoned in the SDCCDP (SDCC 2022). (For a detailed description of the zonings refer to Table 1.2 in Appendix 1 (Local Policy) of this Report.)

The application boundary that incorporates the proposed works potentially includes lands within the following zoning objectives outlines in Table 4.1.

Table 4.1: Zoning Objectives Potentially Affected by the Proposed Scheme

Planning Authority	Zoning Objective	Objective
SDCC	RES – Existing Residential	*To protect and/or improve residential amenity*
	OS – Open Space	*To preserve and provide for open space and recreational amenities*
	MRC – Major Retail Centre	*To protect, improve and provide for the future development of a Major Retail Centre*
	HA – LV – High Amenity Liffey Valley	*To protect and enhance the outstanding character and amenity of the Liffey Valley*
	RW – Retail Warehousing	*To provide for and consolidate retail warehousing*

The Proposed Scheme, for the most part comprises lands within the existing public road and pedestrian pavement area where there is no specific zoning objective.

4.2.1.1 Map Based and Objectives

Along this section of the Proposed Scheme there are a number of distinct map-based objectives from the SDCCDP (SDCC 2022). It is noted that there is a cluster of protected structures along the N4 Lucan Bypass.

Table 4.2: Map Based Objectives

Map Based Objective	Description	Scheme Response
SDCC		
Long Term High Capacity Public Transport (RPA Preferred Route) - 'along Fonthill Road crossing the Lucan Bypass	*Long Term High Capacity Public Transport*	The Proposed Scheme aligns with the objective as it will provide the infrastructure necessary to accommodate increased services along the route. It will promote an efficient, reliable and frequent public transport service as well as provide the advantage of segregated cycling facilities along the preferred route in both directions.
NTA Greater Dublin Cycle Network Plan	*Priority should be given to provision of infrastructure including safe cycle ways, footpaths and improved permeability schemes through the Cycle South Dublin programme and other such initiatives*	The Proposed Scheme will deliver safer, segregated cycling facilities along the corridor as part of BusConnects.

Map Based Objective	Description	Scheme Response
SDCC		
Protect and preserve significant views	*Views that are identified for protection and preservation are identified on the Development Plan maps. Prospects are listed in Table 3.5 and relate to prominent landscapes or areas of special amenity value or special interest that are widely visible from surrounding areas. Prospects from prominent public places will be protected.*	No prospect listed is in proximity to the Proposed Scheme, however, the Development Plan indicates an objective to Protect and Preserve Significant Views north from eastbound lane of the N4 at the N4 / Fonthill Road Junction.
Record of Protected Structures	*A protected structure is a structure that the Planning Authority considers to be of special interest from an architectural, historical, archaeological, artistic, cultural, scientific, social or technical point of view.*	The design of the Proposed scheme has had regard to the presence buildings, structures and sites contained in the Record of Protected Structures. The EIAR contains an assessment of the potential impacts on architectural heritage and cultural impacts and includes for impact mitigation measures.
Transport Junctions (Fonthill Road/N4)	*Upgrade to provide greater access/egress to Liffey Valley Shopping Centre and South Lucan, improve traffic flow and alleviate tailbacks onto the N4.*	Junctions have been designed to ensure a high level of comfort and priority for sustainable modes of travel e.g., walking, cycling and public transport, by prioritising the space and time allocated to these modes within the operation of a junction, and subsequently to accommodate the forecasted future year traffic volumes as safely and efficiently as possible within the remaining space and time. This has allowed the design to maximise the number of people moving through each junction and to prioritise these sustainable modes of travel.
Tree Preservation Order Boundary	*Review Tree Preservation Orders (TPO) within the County and maintain the conservation value of trees and groups of trees that are the subject of a Tree Preservation Order while also recognising the value of and protecting trees and hedgerows which are not subject to a TPO.*	A TPO - Dublin County Council Tree Preservation (Quarryvale, Brooklawn) (Liffey Valley No.1) Order 1990 – is located at King's Hospital. The Proposed Scheme does not impact on these trees. The sensitivity is very high and the magnitude of change is negligible. The potential townscape / streetscape and visual effect on TPOs is assessed to be Neutral, Imperceptible and Temporary / Short-Term.
Site of Geological Interest	*The County Geological Sites are recognised as an intrinsic component of South Dublin County's natural heritage resource, to be protected from potentially damaging development and to be promoted for their educational, scientific, recreational, and geo-tourism potential.*	The Proposed Scheme impact on the geological heritage resource of the county is assessed to be imperceptible.

4.2.1.2 LAPs / Masterplans

As outlined in Section 3.7.1.4 above, a very small section of the Proposed Scheme (Fonthill Road to Cold Cut Road) is within the Liffey Valley LAP.

Table 4.3: Liffey Valley LAP (SDCC 2009)

Section	Policy / Objective	Project Response
5.4	*Connectivity: Street and through site links should provide direct connections between destinations. Local access streets should foster pedestrian and cyclist activities.*	The Proposed Scheme will facilitate this objective.
5.4	*Permeability: Permeability levels should be maximised, particularly in medium and higher density areas to foster pedestrian and cyclist activity.*	The Proposed Scheme directly contributes to the delivery of improved cycle networks and through the plan area.

4.2.1.3 Planning History

A planning history search was undertaken for the lands within the Proposed Scheme application boundary. It includes planning applications that have been granted planning permission within the last 10 years. Table 2.1 in

Appendix 2 (Planning History) contains the extant planning permissions along this section of the Proposed Scheme.

4.2.1.4 Proposed Scheme Response

As set out above and at Appendix 1, the Proposed Scheme is consistent with the policies and objectives of the SDCCDP (SDCC 2016). As shown in Section 3.7.1 the Proposed Scheme is in line with the Policies and Objectives of the LAP.

4.3 M50 Junction 7 to R148 Con Colbert Road – R148 Palmerstown Bypass and Chapelizod Bypass

4.3.1 Zoning

The lands are within the functional area of SDCC and DCC and are zoned in the SDCCDP (SDCC 2022) and DCDP (DCC 2016). For a detailed description of the zonings refer to Table 2.2 in Appendix 1 (Local Policy).

The application boundary that incorporates the Proposed Scheme works potentially includes lands within the following zoning objectives outlined in Table 4.3.

Table 4.3: Zoning Objectives Potentially Affected by the Proposed Scheme

Planning Authority	Zoning Objective	Objective
SDCC	HA – LV – High Amenity Liffey Valley	*To protect and enhance the outstanding character and amenity of the Liffey Valley*
	RES – Existing Residential	*To protect and/or improve residential amenity*
	VC – Village Centre	*To protect, improve and provide for the future development of Village Centres*
	OS – Open Space	*To preserve and provide for open space and recreational amenities*
DCC	Zone Z9 – Amenity / Open Space Lands / Green Network	*To preserve, provide and improve recreational amenity and open space and green networks*
	Zone Z1 – Sustainable Residential Developments	*To protect, provide and improve residential amenities*

As mentioned earlier above, in general the Proposed Scheme is within the existing pavement and road area.

4.3.1.1 Map Based and Objectives

Along this section of the Proposed Scheme there are a number of distinct map-based objectives from the SDCCDP (SDCC 2022) and DCDP (DCC 2016).

Table 4.4: Map Based Objectives

Map Based Objective	Description	Scheme Response
SDCC		
Specific Local Objectives – SM4 SLO2	*To preserve the character of Palmerstown Village by limiting any future development on the former Vincent Byrne site to three storeys in height, and two storeys where it backs or sides onto adjoining two storey housing*	The Proposed Scheme will not impact on the future development of structures in Palmerstown Village.
NCBH20 SL0:3	*To assess the houses 1 to 8 in Red Cow Cottages and 1 to 8 Woodfarm Cottages,*	The Proposed Scheme will not impact on houses 1 to 8 in Red Cow Cottages and 1 to 8 Woodfarm Cottages,

Map Based Objective	Description	Scheme Response
SDCC		
	Palmerstown (that were designed by the famous Dublin Architect Brown, who also designed those in Rathfarnham) with a view to protecting them via an Architectural Conservation Area.	Palmerstown future to become protected under an Architectural Conservation Area.
Record of Protected Structures	*A protected structure is a structure that the Planning Authority considers to be of special interest from an architectural, historical, archaeological, artistic, cultural, scientific, social or technical point of view.*	The design of the Proposed scheme has had regard to the presence of buildings, structures and sites contained in the Record of Protected Structures. The EIAR contains an assessment of the potential impacts on architectural heritage and cultural impacts and includes for impact mitigation measures.
Transport Junctions (Kennelsfort Road Upper)	*Provision of grade separated junction to enhance the efficiency of the junction, particularly for buses on the N4/Lucan Road QBC and ensure safe crossing facilities are provided for all users.*	Junctions have been designed to ensure a high level of comfort and priority for sustainable modes of travel e.g., walking, cycling and public transport, by prioritising the space and time allocated to these modes within the operation of a junction, and subsequently to accommodate the forecasted future year traffic volumes as safely and efficiently as possible within the remaining space and time. This has allowed the design to maximise the number of people moving through each junction and to prioritise these sustainable modes of travel.
DCC		
Site of Archaeological Interest – Chapelizod Bypass	*Sites of archaeological interest shall be subject to archaeological excavation and recording according to best practice, in advance of redevelopment*	Along the Proposed Scheme all archaeological and cultural heritage issues will be resolved by mitigation during the pre-construction phase or construction phase, in advance of the operational phase. The Proposed Scheme was informed by relevant legislation, guidelines, policy, and advice notes.
Conservation Areas	*'Conservation Areas have been designated in recognition of their special interest or unique historic and architectural character and important contribution to the heritage of the city…All new development must have regard to the local context and distinctiveness and the contribution to the local scene of buildings, landmarks, views, open spaces and other features of architectural, historic or topographical interest.'*	Along the Proposed Scheme all archaeological and cultural heritage issues will be resolved by mitigation during the pre-construction phase or construction phase, in advance of the operational phase. It aims to mitigate any adverse effects that the proposals may have on the streets, spaces, local areas and landscape through the use of appropriate design responses. In addition, opportunities have been sought to enhance the public realm and landscape design where practicable.

4.3.1.2 LAPs / Masterplans

There are no LAPs or Masterplans within this section of the Proposed Scheme.

4.3.1.3 Planning History

Table 2.1 in Appendix 2 (Planning History) contains the extant planning permissions along this section of the Proposed Scheme.

4.3.1.4 Proposed Scheme Response

The Proposed Scheme is consistent with the policies and objectives of the SDCCDP (SDCC 2016) and the DCDP (DCC 2016).

4.4 R148 Con Colbert Road to City Centre – St. John's Road West

4.4.1 Zoning

The lands are within the functional area of DCC and are zoned in the DCDP (DCC 2016). For a detailed description of the zonings refer to Table 2.2 in Appendix 1 (Local Policy).

The application boundary that incorporates the Proposed Scheme works potentially includes lands which adjoins and/or incorporates the following zoning objectives outlined in Table 4.5.

Table 4.5:Zoning Objectives Potentially Affected by the Proposed Scheme

Planning Authority	Zoning Objective	Objective
DCC	Z1 - Sustainable Residential Neighbourhoods	*To protect, provide and improve residential amenities*
	Zone Z5 – City Centre	*To consolidate and facilitate the development of the central area, and to identify, reinforce, strengthen and protect its civic design character and dignity*
	Zone Z6- Employment / Enterprise	*To provide for the creation and protection of enterprise and facilitate opportunities for employment creation.*
	Z7 – Employment (Industry)	*To provide for the protection and creation of industrial uses, and facilitate opportunities for employment creation including Port Related Activities.*
	Zone Z9 – Amenity / Open Space Lands / Green Network	*To preserve, provide and improve recreational amenity and open space and green networks*
	Z10 - Inner Suburban (Sustainable Mixed-Use)	*To consolidate and facilitate the development of inner city and inner suburban sites for mixed uses, with residential the predominant use in suburban locations, and office/retail/residential the predominant uses in inner city areas*
	Zone Z15 – Institutional and Community	*To protect and provide for institutional and community uses*

As mentioned earlier above, in general the Proposed Scheme is within existing pavement and road.

4.4.1.1 Map Based and Objectives

Along this section of the Proposed Scheme there are a number of distinct map based objectives from the DCDP (DCC 2016).

Table 4.6:Map Based Objectives

Map Based Objective	Description	Scheme Response
DCC		
Zone of Archaeological Interest (along Con Colbert Road)	*Zones of Archaeological Interest in urban areas can provide challenges to development and regeneration as well as providing opportunities for understanding our past. Development proposals for sites in the archaeological zone should be subject to pre-planning discussion and applications accompanied by an archaeological assessment*	Along the Proposed Scheme all archaeological and cultural heritage issues will be resolved by mitigation during the pre-construction phase or construction phase, in advance of the operational phase. The Proposed Scheme was informed by relevant legislation, guidelines, policy, and advice notes.
Strategic Development and Regeneration Areas (SDRA) 7 – Heuston Station and Environs	*'These represent significant areas of the inner and outer city with substantial development capacity and the potential to deliver the residential, employment and recreational needs of the city…. Key objectives that must be achieved are set out on issues such as: mix*	The Proposed Scheme aims to create attractive, consistent, functional and accessible places for people alongside the core bus and cycle facilities. The Proposed Scheme will also enhance interchanges between the various modes of public transport operating in Dublin City and its wider metropolitan area. The design has been developed with this in mind and,

Map Based Objective	Description	Scheme Response
DCC		
	of uses; street network and linkages within the area and to surrounding areas; provision of urban spaces, parks and playgrounds; and provision of retail and recreational facilities' Key guiding principles include: '*To develop a new urban gateway character area focused on the transport node of Heuston Station with world class public transport interchange facilities, vibrant economic activities, a high-quality destination to live, work and socialise in, a public realm and architectural designs of exceptional high standard and a gateway to major historic, cultural and recreational attractions of Dublin City'*	in so far as possible, is seeking to provide for improved existing or new interchange opportunities with other transport services.
Road Scheme and Bridges (St John's Road West to Parkgate Street)	*'A number of key road capacity improvements are required to facilitate the sustainable and safe movement of goods and people throughout the city and to ensure ease of access.'*	The Proposed Scheme aligns with the objective as it will provide improved travel times combined with increased services will promote an efficient, reliable and frequent public transport service as well as provide the advantage of segregated cycling facilities along the Proposed Scheme.
Conservation Areas	*'Conservation Areas have been designated in recognition of their special interest or unique historic and architectural character and important contribution to the heritage of the city…All new development must have regard to the local context and distinctiveness and the contribution to the local scene of buildings, landmarks, views, open spaces and other features of architectural, historic or topographical interest.'*	Along the Proposed Scheme all archaeological and cultural heritage issues will be resolved by mitigation during the pre-construction phase or construction phase, in advance of the operational phase. It aims to mitigate any adverse effects that the proposals may have on the streets, spaces, local areas and landscape through the use of appropriate design responses. In addition, opportunities have been sought to enhance the public realm and landscape design where possible.

4.4.1.2 LAPs / Masterplans

This section of the Proposed Scheme will pass through the Liberties LAP (DCC 2009) as outlined in Section 3.7.4.4 and adjacent to the Heuston Masterplan (CIÉ, 2021) as outlined in Section 3.7.7.

4.4.1.3 Planning History

Table 2.1 in Appendix 2 (Planning History) contains the extant planning permissions along this section of the Proposed Scheme.

4.4.1.4 Proposed Scheme Response

The Proposed Scheme is consistent with the policies and objectives of the DCDP (DCC 2016).

In general, the red line extends to lands which comprise of existing pavement, roads or planted areas. The works being carried out at these locations will enhance the sites and will not prohibit the long term zoning objective from being achieved.

5. EIAR Structure and Summary of Assessment

5.1 EIAR Structure and Summary of Assessment

The EIAR includes four volumes and is structured as set out below.

Table 5.1:EIAR Structure & Summary of Assessment

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
Volume 1: Non-Technical Summary		
Non-Technical Summary (NTS)	Summary of the EIAR in non-technical language.	N/A
Volume 2: Main Report		
Chapter 1 - Introduction	The Introduction Chapter summarises the procedure for the submission of an application for the Proposed Scheme, describes the methodology used to prepare this EIAR and outlines the consultation activities that have been carried out to date.	N/A
Chapter 2 - Need for the Proposed Scheme	The Project Need Chapter outlines the need for the Proposed Scheme in terms of the supporting statutory basis and its evolvement.	N/A
Chapter 3 – Consideration of Reasonable Alternatives	The Consideration of Reasonable Alternatives Chapter describes the process undertaken in considering reasonable alternatives and the main reasons for the selection of the Proposed Scheme.	N/A
Chapter 4 – Proposed Scheme Description	The Proposed Scheme Description Chapter describes in detail the scheme infrastructure, elements, and route.	N/A
Chapter 5 - Construction	The Construction Chapter describes the construction activities associated with the Proposed Scheme.	A Construction Environmental Management Plan (CEMP) has been prepared which describes the overall environmental management strategy that will be implemented during the Construction Phase of the Proposed Scheme. The CEMP includes the mitigation measures which will be implemented to provide environmental protection during the Construction Phase of the Proposed Scheme. The CEMP includes the mitigation measures which will be implemented to provide environmental protection during the Construction Phase of the Proposed Scheme. Construction Traffic Management is addressed in the CEMP, to show how the interface between the public and construction-related traffic will be managed and how vehicular movement will be controlled.
Chapter 6 – Traffic & Transport	The Traffic & Transport Chapter considered the potential traffic & transport impact associated with the Construction and Operational Phases of the Proposed Scheme.	The assessment concludes that the impact of restrictions on general traffic and cyclists along the Proposed Scheme during the Construction Phase will be negative, moderate and temporary in nature, and with the

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
		application of proposed mitigation measures, the impact on traffic and transport will not be significant. The Proposed Scheme will deliver positive impacts to the quality of pedestrian, cycling and bus infrastructure during the Operational Phase, improving people movement in line with the scheme objectives. These improvements will help to provide an attractive alternative to the private car and promote changes from the use of private cars to walking, cycling and public transport, allowing for greater capacity along the corridor to facilitate the sustainable movement of people as population and employment levels grow in the future. The scheme design has been developed with cognisance of the relevant accessibility guidance and universal design principles so as to provide access for all users. Although it is recognised that there will be some negative impacts for parking / loading availability, the Proposed Scheme has been designed and outlined within the assessment to take cognisance of the relevant traffic and transport guidelines. The assessment demonstrates that there will be no significant deterioration in the general traffic environment in the study area as a consequence of meeting the scheme objectives of providing enhanced sustainable mode priority along the direct study area. Given that the Proposed Scheme results in a positive impact for walking, cycling, bus and people movements, mitigation and monitoring measures have not been considered beyond those already incorporated as part of the Proposed Scheme. The impacts to general traffic and parking / loading, including mitigation measures are incorporated into the Proposed Scheme and no further mitigation measures are considered to be required. Additionally analysis undertaken using the Proposed Scheme models has shown that the new bus infrastructure facilitates a significant level of resilience for bus services that will use the Proposed Scheme, from implementation into the future. The Proposed Scheme will provide a higher level of protection to bus journey time consistency and reliability and will allow the service pattern and frequency of bus services to be increased into the future to accommodate additional demand without having a significant negative impact on bus journey time reliability or the operation of cycle and pedestrian facilities.
Chapter 7 - Air Quality	The Air Quality Chapter considered the potential air quality impact associated with the Construction and Operational Phases of the Proposed Scheme.	The impacts assessed for the Construction Phase include dust emissions from activities such as site clearance and preparation, utility diversions, road and junction construction works, and landscaping. Appropriate mitigation measures to ensure that construction dust nuisance is minimised will be implemented for the duration of the Construction Phase. Air quality impacts associated with Construction Phase traffic and changes in traffic flows have also been assessed. The assessment concluded that Construction Phase traffic emissions will be neutral overall in the study area. The assessment of potential air quality impacts associated with Construction Phase activities concludes that the works will be temporary and/or short-term in nature, and with the application of the proposed mitigation measures, the impact on air quality will not be significant. No mitigation measures are required during the Operational Phase as the assessment identifies a generally negligible or beneficial impact on air quality in the vicinity of the Proposed Scheme. These impacts are

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
		predicted to reduce to negligible by 2043. The assessment concludes that the overall the impact on air quality along the Proposed Scheme will neutral and long-term.
Chapter 8 - Climate	The Climate Chapter considered the potential climate impact associated with the Construction and Operational Phases of the Proposed Scheme.	The Proposed Scheme is estimated to result in total Construction Phase greenhouse gas emissions of approximately 8,498 tonnes embodied CO_{2eq} for materials over the approximate 24-month construction period, equivalent to an annualised total of 0.011% of Ireland's non-ETS 2020 target and 0.071% of the 2030 Transport Emission Ceiling. Following the application of mitigation measures, it is expected that there will be a negative, minor and short-Term residual impact on climate as a result of the Construction Phase of the Proposed Scheme. The maintenance greenhouse gas emissions associated with the Operational Phase of the Proposed Scheme is predicted to generate 440 tonnes CO_{2eq} over the predicted 60-year lifespan. Following the implementation of mitigation, this impact is predicted to be negligible and permanent. The operational traffic greenhouse gas emissions associated with the Operational Phase of the Proposed Scheme is predicted to be positive, minor and permanent. Overall, when the carbon emissions associated with the maintenance phase and the Operational Phase are combined, the net greenhouse gas emissions will be positive, minor and permanent.
Chapter 9 – Noise & Vibration	The Noise & Vibration Chapter considers the potential noise and vibration impacts associated with the Construction and Operational Phases of Proposed Scheme.	Following the application of mitigation measures, it is expected that noise impacts associated with the Construction Phase will be negative, slight to moderate, and temporary during all key Construction Phases during daytime periods. During evening periods, noise impacts associated with the Construction Phase will be negative, Moderate to significant and temporary within 20m of the works depending on the specific activities. With the adoption of best practice methodologies, vibration impacts at the most sensitive premises can be adequately mitigated to within acceptable levels relating to disturbance The impacts assessed during the Operational Phase relate to changes in traffic noise levels along the Proposed Scheme as a result of reconfigured cross sections, to include new or upgraded bus lanes and predicted changes in traffic movement. The Proposed Scheme aligns with policy objectives to reduce populations exposure to traffic noise across the city through the incorporation of improved public transport, and increasing bus, train, and bicycle journeys and the replacement of diesel fleet to electric and natural gas fleet. Once operational, there will be a Positive to Neutral impact along the Proposed Scheme due to a reduction in traffic volumes during both the Opening Year (2028) and the Design Year (2043). During the Opening Year (2028), a direct, positive, imperceptible, short to medium term to, negative, slight, short to medium term change in traffic noise levels will occur along the surrounding road network outside of the Proposed Scheme. Whilst an element of traffic re-distribution will occur during daytime periods, the

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
		resultant noise impacts are negative, slight and short to medium term. During the Design Year (2043), an indirect, positive, imperceptible, long Term to negative, not significant to slight, long-term change in traffic noise levels will occur along the surrounding road network outside of the Proposed Scheme. Whilst an element of traffic re-distribution will occur during daytime periods, the resultant noise impacts are Negative, Not Significant to Slight and Long Term. There are no significant residual Operational Phase noise or vibration impacts associated with the Proposed Scheme, whilst meeting the scheme objectives.
Chapter 10 - Population	The Population Chapter considered the potential population impact associated with the Construction and Operational Phases of the Proposed Scheme.	The assessment concluded that there will be negative, not significant short-term impacts on the community facilities in the community areas of Lucan, Rowlagh – Quarryvale, Palmerstown, Chapelizod, Ballyfermot, Inchicore (Mary Immaculate) and James's Street during the Construction Phase. Neutral, not significant and short-term amenity impacts are expected in all other community areas (Ballyfermot Upper, Inchicore (St Michael's) and Halston Street) during the Construction Phase. Liffey Gaels GAA Club, located in Inchicore (Mary Immaculate), is expected to experience a negative, significant and short-term Construction Phase impact as it is adjacent to the location of Construction Compound LU3. The Hermitage Golf Club, located in Lucan community area, is expected to experience a negative, moderate and short-term effect during construction due to land take required to undertake the works. Hermitage Park and Hermitage Medical Clinic, both also located in Lucan community area, are expected to experience a negative, slight and short-term effect during the Construction Phase. Overall, the impact of land take across the impacted community areas as a whole is considered negative, slight and short-term during the construction phase. positive, moderate to very significant and long-term impacts are expected on walkers, cyclists and bus users in the community areas of Lucan, Rowlagh – Quarryvale, Palmerstown, Ballyfermot Upper, Chapelizod, Inchicore (Mary Immaculate) and James's Street during the Operational Phase. Access to community facilities and commercial businesses via private vehicles along the Proposed Scheme is expected to be a positive, slight and long term impact in the community areas of Lucan, Rowlagh – Quarryvale, Palmerstown, Ballyfermot Upper, Chapelizod, Inchicore (Mary Immaculate) and James's Street. There will be negative, not significant and long-term commercial land take impacts in the community areas of Lucan, Palmerstown, James's Street and Rowlagh – Quarryvale. All other community areas are not expected to experience a change in access as the impact of redistributed traffic is neutral, not significant and long-term and is therefore not expected to change accessibility in the surrounding road network. In achieving the aims and objectives of the Proposed Scheme, it will provide an attractive alternative to the use of private vehicles and promoting a modal shift to walking, cycling and public transport, allowing for greater capacity along the corridor to access residential, community and commercial receptors.

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
Chapter 11 – Human Health	The Human Health Chapter considered the potential human health impacts associated with the Construction and Operational Phases of the Proposed Scheme.	Temporarily increased traffic congestion because of traffic management measures and diversions would likely cause frustration and annoyance particularly for commuters and people travelling to appointments. Construction noise and vibration, as well as dust may cause annoyance for some nearby residents and workers. The temporary to short-term nature of these impacts means that no lasting impact on health is likely. Construction traffic management has been considered to outline measures deemed necessary to provide protection for pedestrians and cyclists in each location of the Proposed Scheme. With these measures in place the risks will be mitigated. Since the construction works will be short-term overall and temporary, the Proposed Scheme is not likely to result in any increased exposure to risk for pedestrians and cyclists over and above trends in the current street environment in Dublin. In addition, access for emergency services will be maintained during the Construction Phase. During the Operational Phase, reductions in general through-traffic, improved pedestrian infrastructure and improvements to the streetscape are likely to encourage more social interaction along the Proposed Scheme, resulting in positive health outcomes such as good mental wellbeing. The new public transport infrastructure is expected to bring improved journey times and improved reliability for public transport journeys, resulting in improved mental health outcomes such as reduced stress, as well as improved access to health, employment, education, and leisure services. The inclusion of bus priority measures and improvements to pedestrian and cyclist infrastructure will support safer and more equitable access for those who do not or cannot use a car. This is expected to have positive impacts on health, by addressing these wider determinants and health inequalities. In addition the urban environment would be improved and easier to use for a wider variety of pedestrians, including the visually impaired, wheelchair users and the persons with mobility impairment.
Chapter 12 - Biodiversity	The Biodiversity Chapter considered the potential biodiversity impact associated with the Construction and Operational Phases of the Proposed Scheme.	A range of mitigation measures will be implemented to avoid or reduce negative impacts on biodiversity during the Construction Phase, including pre-construction surveys for badgers/bats, and replacement planting. Invasive species management will be implemented to mitigate any risk of the Proposed Scheme contributing to the spread of invasive species during the Construction Phase. The assessment concluded that with the application of the proposed mitigation measures, the impact on biodiversity during construction and operation will be not significant beyond the local level, with no significant adverse impacts predicted for any Special Conservation Interests of any European sites. In addition, potential impacts on designated European sites are specifically assessed in the Natura Impact Statement (NIS), which also forms part of this application. The conclusion of the NIS is that the Proposed Scheme will not adversely affect the integrity of any European site.
Chapter 13 - Water	The Water Chapter considered the potential water impact associated with the Construction and Operational Phases of the Proposed Scheme.	Following the implementation of the mitigation measures no significant remaining impacts are anticipated on any water body as result of the Construction Phase of the Proposed Scheme. The impacts assessed during the Operational Phase include the potential surface water impacts associated with areas of impermeability and traffic displacement. During the Operational Phase, the

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
		design of the Proposed Scheme will ensure that there will be no net increase in surface water runoff rates to any of the connected waterbodies, using a combination of sustainable drainage systems in the form of filter drains and bioretention systems, which also reduce the potential risks to water quality from routine road contaminants. In the Operational Phase the infrastructure (including the sustainable drainage systems) will be maintained by the Local Authorities, and will be subject to their management procedures. No additional mitigation is required, and no impacts are anticipated on any water body as result of the Operational Phase of the Proposed Scheme
Chapter 14 – Land, Soils, Geology & Hydrology	The Land, Soils, Geology & Hydrology Chapter considered the potential land, soils, geology & hydrology impact associated with the Construction and Operational Phases of the Proposed Scheme.	Appropriate mitigation measures will be implemented to avoid or reduce negative impacts on land, soils, geology and hydrogeology during the Construction Phase. It is expected that there will be no residual construction impacts on land, soils, geology and hydrogeology. The impacts assessed during the Operational Phase include the potential land, soils, geology and hydrogeology impacts associated with changes to water supply and the pollution of groundwater and watercourses. In the Operational Phase the infrastructure will be maintained by the Local Authorities, and will be subject to their management procedures to ensure that the correct measures are taken in the event of any accidental spillages and this will reduce the potential for any impact. It is predicted that there will be no residual operational impacts on land, soils, geology and hydrogeology.
Chapter 15 – Archaeological & Cultural Heritage	The Archaeological & Cultural Heritage Chapter considered the potential archaeological & cultural heritage impact associated with the Construction and Operational Phases of the Proposed Scheme.	The mitigation measures proposed to avoid or reduce negative impacts on archaeological and cultural heritage during the Construction Phase include the provision for and funding of the necessary archaeological monitoring, inspection and excavation works that will be required during and prior to construction. There will be no Operational Phase impacts as a result of the Proposed Scheme. With the implementation of the proposed mitigation measures, it is expected that there will be no significant residual impacts on archaeological and cultural heritage.
Chapter 16 – Architectural Heritage	The Architectural Heritage Chapter considered the potential architectural heritage impact associated with the Construction and Operational Phases of the Proposed Scheme.	The main potential impacts on architectural heritage during the Construction Phase will include: • Direct impacts to the boundaries (walls, railings etc.) and entrance gates of protected structures and other architectural heritage features where road widening is required; • Direct impacts to street furniture (i.e. lamp posts, post boxes, etc.) due to land acquisition, construction works to pavements, changes in the layout of footpaths and landscaping works; • Indirect impacts as a result of the potential for damage to sensitive structures in areas where the construction works for the Proposed Scheme come into close contact with these structures; • Indirect impacts as a result of the potential for damage to protected structures due to increased vibration from construction vehicles; and Visual impacts on the setting of protected structures or buildings or structures of architectural heritage interest,

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
		historic streetscapes and views which will temporarily impact on their setting during the Construction Phase. The mitigation measures proposed to avoid or reduce negative impacts on architectural heritage during the Construction Phase include: • Appropriate recording, protection, removal, storage and reinstatement of boundaries and street furniture; and • The retention or replacement of trees along the Proposed Scheme. Once the mitigation measures have been applied, there will be no significant residual impacts on the architectural heritage resource as a result of the Construction and Operational Phase of the Proposed Scheme.
Chapter 17 – Landscape (Townscape) & Visual	The Landscape (Townscape) & Visual Chapter considered the potential landscape (townscape) & visual impact associated with the Construction and Operational Phases of the Proposed Scheme.	With the implementation of the proposed mitigation measures, it is expected that there will be negative, moderate to significant, temporary/ short-term townscape/streetscape impacts on all sections of the Proposed Scheme during construction. There will also be neutral to very significant, negative, temporary/short-term townscape / visual impacts on features such as amenity designations, conservation areas, properties in temporary acquisition and trees and vegetation during the Construction Phase. During the Operational Phase, there will be positive slight to moderate long-term townscape and streetscape impacts on all sections. For conservation areas and protected structures, there will be neutral to positive, moderate and long-term streetscape and visual impacts during the Operational Phase (assessed at 15 years post construction). With regard to amenity designations (e.g., Hermitage Golf Club, Liffey Valley High Amenity Area, Dr. Steevens' Hospital, open space areas adjacent to Knockmaree Apartments and north of the R148 at Liffey Gaels), there will be townscape and visual impacts ranging from neutral, slight to moderate and long-term to positive, moderate and long-term (assessed at 15 years post construction). The Proposed Scheme has been subject to an iterative design development process which has sought insofar as practicable to avoid or reduce negative impacts, including townscape and visual impacts. In the Operational Phase localised residual impacts will remain for properties experiencing permanent land acquisition and in the loss of trees particularly at Chapelizod Hill Road, where there would be a negative moderate and long-term impact. There will be overall positive impacts for all sections of the scheme as the Proposed Scheme provides for improvements in the urban realm, which will provide positive long-term effects for the townscape and visual character, most notably along Old Lucan Road, along sections of the R148 and at the junction of Con Colbert Road and South Circular Road. The Proposed Scheme will represent a less car-centric urban realm providing for a significantly enhanced level of service for public transport and for pedestrian / cycle connectivity.
Chapter 18 – Waste & Resources	The Waste & Resources Chapter considered the potential waste & resources impact associated with the Construction and Operational Phases of the Proposed Scheme.	A range of mitigation measures will be implemented to avoid or reduce negative impacts on waste and resources during the Construction Phase, including minimising waste disposal, in so far as reasonably practicable. The

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
		predicted impact of excavation waste during the Construction Phase, is adverse, slight, and short-term. The main potential impacts on waste and resources during the Operational Phase will be waste generated from road maintenance activities following completion of the Construction Phase. The predicted impact of operational construction and demolition waste will be adverse, not significant, and long-term. With the implementation of the proposed mitigation measures, it is expected that there will be no residual significant impacts on waste and resources.
Chapter 19 – Material Assets	The Material Assets Chapter considered the potential material assets impact associated with the Construction and Operational Phases of the Proposed Scheme.	With the implementation of the proposed mitigation measures there will be no significant residual impacts on material assets as a result of the construction of the Proposed Scheme. There will be no Operational Phase impacts on utility infrastructure. Due to the measures included in the design of the Proposed Scheme and the fact that there are minimal impacts predicted during the Operational Phase, no specific mitigation measures are required.
Chapter 20 – Risk of Major Accidents and / or Disasters	The Risk of Major Accidents and / or Disasters Chapter assesses the potential significant adverse impacts on the environment during the Construction and Operational Phases of the Proposed Scheme.	Appropriate mitigation measures will be implemented during the Construction Phase, including the implementation of a Construction Environmental Response Plan and an Environmental Incident Response Plan. With the application of these mitigation measures, there are no remaining identified incidents or major accidents and / or disasters risk events that present a level of risk that would lead to significant impacts or environmental effects.
Chapter 21 – Cumulative Impacts & Environmental Interactions	The Cumulative Impacts & Environmental Interactions Chapter considers the potential cumulative impacts on the environment of the Proposed Scheme with other developments.	No likely significant cumulative effects relating to traffic and transport are predicted, over and above the effects of the Proposed Scheme assessed in isolation. The Biodiversity assessment identified potential for significant residual cumulative effects with regard disturbance and displacement of non-SCI breeding birds during construction and habitat loss for some projects in conjunction with the Proposed Scheme. However, these cumulative effects will be at the local geographic scale and short-term as construction will be temporary. The Landscape (Townscape) and Visual assessment identified the potential for temporary indirect cumulative townscape and visual effects to occur as a result of other projects in conjunction with the Proposed Scheme should the construction periods either overlap or follow on within a short timeframe with the Proposed Scheme. Effects would be reduced or negligible if this is not the case. In most cases the potential impacts are likely to be localised and contained, due to the enclosing effect of the surrounding built form. No other significant construction related cumulative effects were identified from the Proposed Scheme in combination with other projects (including the other Core Bus Corridor Schemes) over and above those identified in the standalone assessments. For Operational Effects, the assessments assume all 12 proposed Bus Corridor Schemes would be operational, along with other identified projects and GDA Strategy projects included in the Do Minimum and Do Something scenarios. For traffic and transport, the assessment predicted that the Proposed Scheme and the other 11

EIAR Chapter	Summary Descriptive Text	Assessment Outcome
		Core Bus Corridor schemes are expected to facilitate a long term, profound positive cumulative effect on People Movement by sustainable modes. The Core Bus Corridor schemes are seen to enable significant improvements in People Movement by sustainable modes along the direct Core Bus Corridor routes, particularly by bus and cycling, with reductions in car mode share due to the enhanced sustainable mode provision. The Proposed Scheme and the other 11 Core Bus Corridor schemes provide for enhanced integration and efficiencies for all public transport modes by facilitating substantial increases in public transport average network wide travel speeds. The traffic and transport assessment predicts a long term, profound positive cumulative effect on People Movement by sustainable modes as a result of the Proposed Scheme and the other 11 Core Bus Corridor schemes. The Landscape (Townscape) and Visual assessment identified that while the implementation of the mitigation proposed will assist in reducing cumulative effects and protecting retained features of value, there remains potential for slight / moderate short-term cumulative effects for five other Major Projects and the Liffey Valley to City Centre Core Bus Corridor scheme in conjunction with the Proposed Scheme. Medium and long-term cumulative effects expected to be neutral or positive. The only other significant operational cumulative impacts identified over and above the standalone scheme relate to human health. It was assessed that the proposals for the Lucan Luas, DART+ Programme South West, DART+ Tunnel Element (Kildare Line to Northern Line), Greater Dublin Area Cycle Network Plan, new bus interchange facility north of Liffey Valley Shopping Centre and the other Core Bus Corridor schemes are complementary and could have a cumulative beneficial effect by encouraging active travel and increased use of public transport through offering a choice of routes. Due to the substantial size of overall population with the opportunity to benefit from the proposals, the effect is assessed as positive, significant and long-term for health. Significant environmental interactions occur between the topics of population, human health, air quality, noise and vibration and traffic and transport. The assessments made for each of those topics consider those interactions both directly and indirectly. As an environmental factor, landscape and visual considerations have natural relationships with all other environmental factors. Some are direct relationships, e.g., population and visual impacts; biodiversity and landscape; land, soils and water and landscape; or the setting around features of cultural heritage etc. Others may be indirect, e.g. human health, air quality and landscape, material assets and landscape and visual aspects. Wherever possible these potential interactions have been incorporated into the relevant assessments.
Chapter 22 – Summary of Mitigation	The Summary of Mitigation Chapter summarises the mitigation measures recommended for each of the environmental topics examined within the EIAR.	N/A
Chapter 23 – Summary of Significant Residual Impacts	The Summary of Significant Residual Impacts Chapter collates the predicted residual impacts on the environment as identified in this EIAR, stemming from the Proposed Scheme, during construction and operational phases.	N/A

5.1.1 Other Requirements

5.1.1.1 Water Framework Directive (WFD) Assessment

A WFD Compliance Assessment was carried out on the Proposed Scheme.

Taking into consideration the anticipated impacts of the Proposed Scheme on the biological, physico-chemical and hydromorphological quality elements, following the implementation of design and mitigation measures, it is concluded that it will not compromise progress towards achieving GES or cause a deterioration of the overall GEP of any of the water bodies that are in scope (see table below).

Table 5.2: Compliance of the Proposed Scheme with the Environmental Objectives of the WFD

Environmental Objective	Proposed Scheme	Compliance with the WFD Directive
No changes affecting high status sites	No waterbodies identified as high status	Yes
No changes that will cause failure to meet surface water GES or GEP or result in a deterioration of surface water GES or GEP	After consideration as part of the detailed compliance assessment, the Proposed Scheme will not cause deterioration in the status of the water bodies during construction following the implementation of mitigation measures; during operation, no significant impacts are predicted	Yes
No changes which will permanently prevent or compromise the Environmental Objectives being met in other water bodies	The Proposed Scheme will not cause a permanent exclusion or compromise achieving the WFD objectives in any other bodies of water within the River Basin District.	Yes
No changes that will cause failure to meet good groundwater status or result in a deterioration groundwater status.	The Proposed Scheme will not cause deterioration in the status of the of the groundwater bodies.	Yes

The WFD also requires consideration of how a new scheme might impact on other water bodies and other EU legislation. This is covered in Articles 4.8 and 4.9 of the WFD.

Article 4.8 states: '*a Member State shall ensure that the application does not permanently exclude or compromise the achievement of the objectives of this Directive in other bodies of water within the same river basin district and is consistent with the implementation of other Community environmental legislation*'.

All water bodies within the Study Area have been assessed for direct impacts; indirect impacts on Mayne Estuary have also been assessed. The Proposed Scheme will not compromise the achievement of the objectives of the WFD for any water body. In addition, the Proposed Scheme has been assessed for the potential for cumulative impacts with other Proposed Developments within 1km of the Study Area. This concludes that in combination with other Proposed Developments the Proposed Scheme will not compromise the achievement of the objectives of the WFD for any water body. Therefore, the Proposed Scheme complies with Article 4.8.

Article 4.9 of the WFD requires that "Member States shall ensure that the application of the new provisions guarantees at least the same level of protection as the existing Community legislation".

The Habitats Directive (1992) promotes the maintenance of biodiversity by requiring Member States to take measures to maintain or restore natural habitats and wild species listed on the Annexes to the Directive at a favourable conservation status, introducing robust protection for those habitats and species of European importance. There are European designated sites in the vicinity of the Proposed Scheme which have been assessed and are presented in the Natura Impact Statement (NIS). The NIS is a standalone document included in the planning application for the Proposed Scheme. It concludes that the Proposed Scheme will not lead to a deterioration in the features of any designated site. The Proposed Scheme is not considered to be a risk to designated habitats and therefore is compliant with the Habitats Directive.

The Nitrates Directive (1991) aims to protect water quality by preventing nitrates from agricultural sources polluting ground and surface waters and by promoting the use of good farming practices. The Proposed Scheme will not influence or moderate agricultural land use or land management.

The revised Bathing Water Directive (rBWD) (2006/7/EC) was adopted in 2006, updating the microbiological and physico-chemical standards set by the original Bathing Water Directive (BWD) (76/160/EEC) and the process used to measure/monitor water quality at identified bathing waters. The rBWD focuses on fewer microbiological indicators, whilst setting higher standards, compared to those of the BWD. Bathing waters under the rBWD are classified as excellent, good, sufficient or poor according to the levels of certain types of bacteria (intestinal enterococci and Escherichia coli) in samples obtained during the bathing season (May to September). The Proposed Scheme will not impact any designated bathing waters as there is none <2km from the Proposed Scheme. It is therefore compliant with the Bathing Water Directive.

5.1.1.1.1 Conclusion

Considering all requirements for compliance with the WFD, the Proposed Scheme will not cause a deterioration in status in any water body, not prevent it from achieving GES or GEP; there are no cumulative impacts with other Schemes; and it complies with other environmental legislation.

It can be concluded that the Proposed Scheme complies with all requirements of the WFD.

Taking into consideration the impacts of the Proposed Scheme on the biological, physico-chemical and hydromorphological quality elements, it is concluded that following the implementation of design and mitigation measures, it is concluded that it will not compromise progress towards achieving GES or GEP or cause a deterioration of the overall status of the water bodies that are in scope; it will not compromise the qualifying features of protected areas and is compliant with other relevant Directives. It can therefore be concluded that the Proposed Scheme is fully complaint with WFD and therefore does not require assessment under Article 4.7 of the WFD.

5.1.1.2 Flood Risk Assessment (FRA)

A Flood Risk Assessment (FRA) has been carried out as part of the Planning Application for the Proposed Scheme. The following provides a summary of the FRA:

No past flood events have been identified along or near the Proposed Scheme.

The eastern (city centre) end of the Proposed Scheme runs adjacent to the coastal boundaries of the River Liffey (which is tidally influenced). As per the Dublin City Development Plan 2016-2022 Strategic Floor Risk Assessment Vol 7 (DCC 2016a), an area of the Proposed Scheme is located within Flood Zone B.

There is an area of the Proposed Scheme where there is a significant risk of the pluvial flooding. This is located along the R148 Con Colbert Road. The risk of pluvial flooding along most of the proposed route is considered to be high.

The above risks exist in the current scenario and will be reduced as a result of the Proposed Scheme. As where new surface waste sewers are being proposed along the development, these networks shall be designed to provide attenuation for return period of up to 30 years where possible. This would be an improvement on the existing historical drainage network infrastructure and will reduce the overall risk of pluvial flooding. New drainage infrastructure will be provided including the SuDS such as rain gardens, swales, and tree pits where possible. These SuDS features will provide source control measures and reduce the risk of pluvial flooding.

The groundwater vulnerability varies along the proposed development route. As most of the proposed development is on existing roads with no known flooding specifically from groundwater, it is expected that this risk will not increase as a result of the Proposed Scheme.

With the exception of the areas outlines above, the rest of the route does not fall within any flood extents, and therefore categorised as a Vulnerability Class Flood Zone C development.

The Proposed Scheme is categorised by the Guidelines as a 'highly vulnerable development' and is required to pass the justification test if any part of the development is located within Flood Zone A or Flood Zone B. The Plan Making Justification Test and Development Management Justification have been assessed and passed for the Proposed Scheme and further investigation of the flood risk in the form of a Stage 2 FRA is not required.

5.1.1.3 Appropriate Assessment (AA) and Natura Impact Statement (NIS)

A screening for AA was carried out. It was determined that there is a possibility for significant effects on European Sites, as such an AA and NIS is required for the Proposed Scheme.

The NIS for the Proposed Scheme concluded that it will not adversely affect (either directly or indirectly) the integrity of any European Sites, either alone or on combination with other plans or projects.

5.1.2 Non-Statutory Public Consultations

In addition to the extensive Non-Statutory Public Consultation on the Proposed Scheme the BusConnects Infrastructure team undertook consultation on the EIAR with certain prescribed bodies and relevant non-statutory consultees.

Consultations were also conducted with organisations such as the National Parks and Wildlife Services (NPWS), Transport Infrastructure Ireland (TII) and relevant local authorities, and these are considered in the development of the relevant impact assessments chapters in Volume 2 of the EIAR.

In addition to feedback from the non-statutory public consultation process, and with affected landowners, consultations were also undertaken with DCC and SDCC. Consultation was also undertaken with the prescribed bodies and interested parties outlined in the table below, with regard to the approach to the EIAR.

Table 5.3:Prescribed Bodes and Interested Parties

Prescribed Bodies and Interested Parties	
An Chomhairle Ealaíon (Arts Council)	South Dublin County Council (SDCC)
An Taisce	Health Service Executive (HSE)
Dublin City Council (DCC)	The Heritage Council
Department of the Environment, Climate and Communications	Inland Fisheries Ireland (IFI)
Development Applications Unit (DAU) - Department of Culture, Heritage and the Gaeltacht (DCHG)	Irish Water
Department of Transport	Office of Public Works (OPW)
National Tourism Development Authority trading as Fáilte Ireland	Transport Infrastructure Ireland (TII)
Geological Survey Ireland (GSI)	Waterways Ireland

Where practicable, the information and advice received from the consultation process was subsequently incorporated into the design of the Proposed Scheme and addressed in the relevant chapters of the EIAR. Issues raised during the consultation process with the prescribed bodies and interested parties included the following:

- Development Applications Unit (DAU) – Department of Housing, Local Government and Heritage. Consultation meeting held on 5 February 2020 to apprise the DAU of BusConnects and the envisaged approach with regard to EIA / AA;
- Development Applications Unit (DAU) - Department of Culture, Heritage and the Gaeltacht. Comments provided related to the assessment of the impacts of the Proposed Scheme on biodiversity, the completion of ecological surveys (such as trees, hedgerows, bats, birds etc.) alien invasive species, mitigation and monitoring measures and Construction Environmental Management Plans (CEMP);
- Dublin City Council (DCC) comments in relation to the BusConnects Dublin - CBC Infrastructure Works related to transport, air quality, noise, built heritage, street lighting, utility infrastructure, surface water management / flood risk, landscaping, biodiversity and integration with other

transportation projects. Specifically, DCC requested that the EIAR should address alternatives, cumulative impacts, and mitigation. In relation to the Proposed Scheme DCC identified protected structures, Conservations Areas, historic paving and gateways etc. which have the potential to be impacted due to the Proposed Scheme;

- South Dublin County Council (SDCC) comments in relation to the BusConnects Dublin - CBC Infrastructure Works related to the following: traffic flow maintenance, existing traffic speed controls, car parking, construction compounds, work time restrictions, active travel protection, drainage/flood risk, dirt and dust controls, noise, air quality, protection of public realm infrastructure and emerging cycle routes. In relation to the Proposed Scheme SDCC provided comments on the commencement of the route, tree loss, loss of car parking spaces, access during the Construction Phase, and junction design into Palmerstown Village and The Oval;
- Health Service Executive (HSE) comments related to the assessment of likely significant impacts on sensitive receptors, surface water, groundwater, air, noise, vibration, dust and on content of Construction Environmental Management Plans (CEMPS);
- Inland Fisheries Ireland (IFI)'s submission identified each of the rivers to be crossed as part of the BusConnects Dublin - CBC Infrastructure Works and provided a brief summary of their importance. Additionally, IFI provided comments on the design, in-stream works and mitigation measures to be implemented;
- The Environmental Health office of the Health Service Executive provided recommendations in relation to the management of potential pollutants and discharge entering surface waters, the design of suitable drainage systems and storage of fuels and chemicals; and
- Geological Survey Ireland (GSI) were consulted on 21 May 2021, to discuss the BusConnects proposals, and the proposed approach to the assessment of Land, Soils, Geology and Hydrogeology.

Since the initiation of the pre-application public consultation process in November 2018 there has been ongoing engagement with landowners, and / or anyone with an interest in potentially impacted properties or lands along the corridor of the Proposed Scheme, as the design development has progressed.

During each round of public consultation those landowners identified as being either potentially impacted or no-longer potentially impacted were written to directly to receive information on the consultation in advance of any wider publication of the proposals. One-to-one meetings were offered on a face-to-face basis pre-COVID-19, and via Zoom or over the phone since March 2020, for those who wished to discuss the proposals further in relation to their own property with the minutes being recorded as part of the consultation process. Over the three rounds of consultation 44 letters of this kind were issued.

In addition, 2 letters were issued in July 2020 to request access to properties to undertake more detailed noise or topographical surveys.

Throughout the planning process any requests for meetings, phone conversations, or other requests for information have been accommodated where possible. Many of the submissions received during consultations have included those from potentially impacted owners and as with all other submissions they have been considered in the design development.

Most recently during June 2021, 21 letters (registered) have been issued to properties likely to be the subject of the Proposed Scheme Compulsory Purchase Order (CPO) process seeking to engage with them to ascertain ownership details (or to confirm ownership details based on Property Registration Authority – Registry of Deeds referencing research), or to ascertain any others with an interest in the property / lands. Follow-up conversations have been facilitated as a result of these letters on request.

Over the course of the engagements, affected property owners have had the opportunity to discuss, among other things, the following aspects with the BusConnects Infrastructure team:

- Overall scheme proposals and potential impacts;
- Timelines for the scheme design development and associated EIAR assessment;
- Procedural matters such as planning and CPO process;

- Specific details of impact of scheme on landowner property including approximate extent of encroachment; and
- General information around reinstatement and accommodation works.

5.2 References

CIE (2021) Heuston Masterplan

DCC (2009) Liberties Local Area Plan

DCC (2012) Your City Your Space – Dublin City Centre Realm Strategy

DCC (2016a) Dublin City Development Plan 2016 – 2022

DCC (2016b) The Heart of Dublin – City Centre Public Realm Master Plan

DCC (2019b) Dublin City Council Climate Change Action Plan 2019 – 2024

DCC (2021) Draft Dublin City Development Plan 2022 - 2028

DCCAE (2018). National Implementation Plan 2018 - 2020

DCENR (2015). Energy White Paper; Ireland's Transition to a Low Carbon Energy Future 2015 - 2030

Department of Public Expenditure and Reform (2015). Building on Recovery: Infrastructure and Capital Investment Plan

DoT (2021a). Statement of Strategy 2021 – 2023

DoT (2021b). National Investment Framework for Transport in Ireland

DoT (2022) National Sustainable Mobility Policy

DTTAS (2009a). National Cycling Policy Framework 2009 – 2020

DTTAS (2015). Our Transport Future – Strategic Investment Framework for Land Transport

EMRA (2019a). Regional Spatial Economic Strategy for the Eastern and Midlands Region 2019 – 2031

EMRA (2019b). Dublin Metropolitan Area Strategic Plan

European Commission (2019). European Union Green Deal 2019

European Commission (2020). Sustainable and Smart Mobility Strategy 2020

Government of Ireland (2018a). Project Ireland 2040 National Development Plan 2018 – 2027

Government of Ireland (2018b). Project Ireland 2040 National Planning Framework

Government of Ireland (2021b). Climate Action Plan 2021

Government of Ireland (2020). Programme for Government – Our Shared Future 2020

Government of Ireland (2021a). Project Ireland 2040 National Development Plan 2021 – 2030

Government of Ireland (2021c) Climate Action and Low Carbon Development (Amendment) Act

NTA (2011) National Cycle Manual

NTA (2013). Greater Dublin Area Cycle Network Plan

NTA (2015). Core Bus Network Report

NTA (2016). Transport Strategy for the Greater Dublin Area 2016 – 2035

NTA (2019a) Canal Cordon Report 2019

NTA (2019b) Integrated Implementation Plan 2019 – 2024

NTA (2021a). Draft Greater Dublin Area Transport Strategy 2022 – 2042

NTA (2021b). Draft Greater Dublin Area Cycle Network Plan

Regional Planning Guidelines Office (2010). Regional Planning Guidelines for the Greater Dublin Area 2010 – 2022

RSA (2021) Road Safety Strategy 2021 – 2030

SDCC (2008) Liffey Valley Town Centre Local Area Plan

SDCC (2016) South Dublin County Council Development Plan 2016 – 2022

SDCC (2022) South Dublin County Council Development Plan 2022 – 2028

SDCC (2019) South Dublin County Council Climate Change Action Plan 2019 – 2024

UN (2015) 2030 Agenda for Sustainable Development

Directives and Legislation

Council Directive 91/676/EEC concerning the protection of waters against pollution caused by nitrates from agricultural sources

Council Directive 92/43/EEC of 21 May 1992 on the conservation of natural habitats and of wild fauna and flora (as amended)

Council Directive of 8 December 1975 concerning the Quality of Bathing Water (76/160/EEC)

Directive 2006/7/EC Of the European Parliament and of the Council of 15 February 2006 concerning the management of bathing water quality and repealing Directive 76/160/EEC

Number 14 of 1999 - Roads Act, 1993 (as amended)

Number 15 of 2008 - Dublin Transport Authority Act, 2008 (as amended)

Regulation (EU) No. 1315/2013 of the European Parliament and of the Council on Union guidelines for the development of the trans-European transport network

S.I. No. 119 of 1994 - Road Regulations, 1994 (as amended)