



Traffic and Transport Assessment

Proposed Residential Development at Beaumont Road /
Beaumont Grove / Grace Park Court / Ellenfield Road, Beaumont,
Dublin 9

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1. Introduction

1.1 Context

Waterman Moylan has been appointed by Urban Life (BMD) Ltd. to prepare this Traffic and Transport Assessment (TTA) as part of the planning application for a large-scale residential development on a site comprises of 100 No. units located at Beaumont Road / Beaumont Grove / Grace Park Court / Ellenfield Road, Beaumont, Dublin 9.

The proposed Large Scale Residential Development (LRD) will comprise 100 no. apartments/duplexes (17 no. studios, 45 no. 1-beds, 27 no. 2-beds and 11 no. 3 beds) within 4 no. blocks ranging in height from 3 to 6 storeys. All residential units will be provided with associated private balconies/terraces to the north/ south/ east/ west elevations. Provision of internal amenity space and lobby/reception area at ground floor of the apartment block. Vehicular/pedestrian/cyclist access from Grace Park Court and pedestrian/cyclist and emergency access via Ellenfield Road. All associated site development works including import, export and reuse of material to achieve appropriate site levels, infrastructure and enabling works including water services provision and upgrades, public utilities, open spaces (including play areas), surface car parking, set down areas, cycle parking areas/buildings, landscaping and boundary treatment works, plant areas (at ground and roof level), green roofs, roof mounted photovoltaic (PV) panels, ESB substation, and waste storage.

The Schedule of Accommodation is shown in the table below.

Description	Studio	1-bed	2-bed	3-bed	Total
Apartments/Duplexes	17	45	27	11	100

Table 1 | Schedule of Accommodation

1.2 Scope

This Traffic and Transport Assessment is a comprehensive review of all the potential transport impacts of the overall development, including a detailed assessment of the transportation systems provided and the impact of the proposed development on the surrounding environment and road network.

1.3 Response to LRD opinion (Pl. Apl. Reg. Ref. No. LRD9004/26-S2)

This report addresses the comments received in Dublin City Council's LRD Opinion (Planning Application Register Reference No. LRD9004/26-S2), specifically those relating to transportation planning matters, for incorporation into the final LRD application documentation. Detailed responses are provided in Waterman Moylan Consulting Engineers Document No. 20-048.021 *LRD Opinion Response*, and are included within the document package submitted under separate cover.

1.4 Standards

This Traffic and Transport Assessment has been prepared in accordance with Section 15.2.3 (Planning Application Documentation – Planning Thresholds) of the Dublin City Development Plan 2022-2028 and in accordance with the Traffic and Transport Assessment Guidelines published by Transport for Ireland (TII) / National Roads Authority (NRA) in May 2014.

1.5 Threshold for Transport Assessment

Section 2.1 of the *Traffic and Transport Assessment Guidelines (May 2014)* requires submission of a Transport Assessment where a proposed development meets one or more of the following criteria:

- 1- Traffic to and from the development exceeds 10% of the traffic flow on the adjoining road.
- 2- Traffic to and from the development exceeds 5% of the traffic flow on the adjoining road where congestion exists, or the location is sensitive.
- 3- Residential development in excess of 200 dwellings.
- 4- Retail and leisure development in excess of 1,000sqm.
- 5- Office, education and hospital development in excess of 2,500sqm.
- 6- Industrial development in excess of 5,000sqm.
- 7- Distribution and warehousing in excess of 10,000sqm.

For the subject development, threshold No. 3 is met.

In addition, it is assessed the site following Table 15-1 of the *Dublin City Development Plan 2022-2028*. The table sets out the thresholds for planning applications using the following criteria:

- 1- 50 or more residential units.
- 2- Any development with construction of new roads, any project which materially affects vulnerable road users, amendments to existing roads or generating significant road movements.

According with *Dublin City Development Plan 2022-2028* threshold No. 1 is met.

1.6 Site Location

The subject site is located at Beaumont Road, Beaumont, Dublin 9.

The subject site is approximately 0.58 hectares, bounded by the Beaumont Grove Road to the northeast, by the Grace Park Court and Beaumont Road to the southeast and by Grace Park Court to the southwest and existing neighbouring houses to the north and west.

The location of the site is shown in **Figure 1**.



Figure 1 | Site Location
(Source: Google Earth)

1.7 Programme

Based on the existing programme, it is estimated that the development will be completed before 2028 and during 2029 will be occupied. For the purposes of this Traffic and Transport Assessment, therefore, the opening year is 2030.

Note: The assessment years may lag pending approval of the planning application and may differ from the programme.

1.8 Assessment Years

The years that have been assessed as part of this Traffic and Transport Assessment are the following:

- Base Year..... 2026
- Opening Year (With / Without Development)..... 2030
- Opening Year + 5 Years Forecast (With / Without Development) 2035
- Opening Year + 15 Years Forecast (With / Without Development) .. 2045

These assessment years are in line with the 'Transport Assessment Guidelines (May 2014)'. Details of each assessment year is presented later in this report.

1.9 Documents Consulted

The following documents were consulted during the preparation of this Traffic and Transport Assessment:

- Cycle Design Manual
https://www.nationaltransport.ie/wp-content/uploads/2023/08/Cycle-Design-Manual_Sept.-2023_Low-Res.pdf
- Dublin City Development Plan 2022-2028
<https://www.dublincity.ie/residential/planning/strategic-planning/dublin-city-development-plan/development-plan-2022-2028>
- Eastern and Midland Regional Spatial and Economic Strategy 2019-2031
https://emra.ie/dubh/wp-content/uploads/2020/05/EMRA_RSES_1.4.5web.pdf
- Greater Dublin Area Transport Strategy (2022 – 2042) Standards
<https://www.nationaltransport.ie/wp-content/uploads/2023/01/Greater-Dublin-Area-Transport-Strategy-2022-42-1.pdf>
- Greater Dublin Area – Cycle Network Plan
<https://www.nationaltransport.ie/wp-content/uploads/2023/01/2022-GDA-Cycle-Network.pdf>
- Implementation Roadmap for the National Planning Framework
<https://npf-cdn-prod.s3.eu-west-1.amazonaws.com/wp-content/uploads/20240502101327/NPF-Implementation-Roadmap.pdf>
- National Planning Framework – Project Ireland 2040
www.gov.ie/pdf/?file=https://assets.gov.ie/246231/39baaa8c-48dc-4f24-83bd-84bbcf8ff328.pdf#page=null
- New Dublin Area Bus Network – Bus Connects
<https://busconnects.ie/wp-content/uploads/2021/01/busconnects-final-summary-report-fa.pdf>
- Project Appraisal Guidelines for National Roads Unit 5.3 - Travel Demand Projections. PE-PAG-02017
<https://www.tiipublications.ie/library/PE-PAG-02017-03.pdf>
- Smarter Travel: A Sustainable Transport Future
www.gov.ie/pdf/?file=https://assets.gov.ie/19854/37d829c9748446349ff586045bfbcab.pdf#page=null
- Spatial Planning and National Roads: Guidelines for Planning Authorities
<https://www.gov.ie/pdf/?file=https://assets.gov.ie/111220/ef2d43a4-d3a0-418a-b0ba-03340e6d083a.pdf#page=null>
- Sustainable Residential Development and Compact Settlements: Guidelines for Planning Authorities.

[www.gov.ie/pdf/?file=https://assets.gov.ie/280882/af1b1694-6ff4-4a14-b2c6-f104347ffb53.pdf#page=null](https://assets.gov.ie/280882/af1b1694-6ff4-4a14-b2c6-f104347ffb53.pdf#page=null)

- Sustainable Urban Housing: Design Standards for New Apartments (2025).
[www.gov.ie/pdf/?file=https://assets.gov.ie/243715/d60aaacd-0b2b-4422-ab91-d511a4720132.pdf#page=null](https://assets.gov.ie/243715/d60aaacd-0b2b-4422-ab91-d511a4720132.pdf#page=null)
- Traffic and Transport Assessment Guidelines. PE-PDV-02045.
<https://www.tiipublications.ie/library/PE-PDV-02045-01.pdf>
- Planning Design Standards for Apartments Guidelines for Planning Authorities, 2025.
https://assets.gov.ie/static/documents/Planning_Design_Standards_for_Apartments_080725_FINAL.pdf

1.10 Study Methodology

The study area for this report is the transport network and junctions immediately surrounding the sites which will be affected as part of the Proposed Developments. The junctions chosen for assessment are outlined in **Section 3.3.2** below and were chosen based on professional judgement and observed vehicle behaviour within the local road network.

In line with best practice, the following methodology has been adopted for this assessment:

- A review of relevant available information was undertaken, as detailed in **Section 1.8** above. This includes the Louth County Development Plan 2021-2027 (incl. Variations 1, 2 & 3), existing traffic information, traffic and transport assessments submitted with planning applications for committed and potential future developments, as well as other pertinent studies.
- An initial desktop study was conducted of the area surrounding the development site, identifying the existing transport links and road junctions with the potential to be affected by the Proposed Developments.
- A site visit was subsequently made to confirm the existing characteristics and conditions of the key junctions detailed in **Section 3.3.2** below.
- The Traffic section of this “Traffic Transport Assessment” is prepared with the following detail:
 - Understand the existing traffic flows.
 - Determine trips to be generated by the Proposed Developments and the committed and potential future developments in the surrounding area.
 - Determine trip distribution for each development.
 - Assess the percentage impact of traffic generated by the site in relation to existing traffic flows at local junctions. Determine if this exceeds 5% at congested junctions or 10% at non-congested junctions.
 - Model the junctions with a high impact, based on the thresholds indicated above.
 - Identify, if necessary, mitigation measures.

1.11 Contents of the Transport Assessment

In accordance with Section 3.3 of the *Traffic and Transport Assessment Guidelines (May 2014)*, the contents of this Traffic and Transport Assessment include:

- **Policy Framework:** Latest Development Plan and Land Area Plan to guide the delivery and management of a package of integrated initiatives which ultimately seek to encourage sustainable travel practices of all residents and visitors travelling to/from the proposed development.
- **Site Assessment:** A description of the proposed development, description of the existing and proposed traffic/transportation conditions including information on the current traffic, critical junctions, pedestrians, cycle, and public transport facilities.
- **Travel Characteristics:** Review of existing local travel characteristics and modal split.

- **Transport Improvements:** Description of proposed transportation improvements to local roads, junctions, public transport, cycle, and pedestrian facilities.
- **Transportation Infrastructure:** Assessment of all potential impacts on transport infrastructure (road cycling, walking public transport), based on construction proposals and demand forecasts. The development impact upon any committed transport schemes should also be appraised. Design details should be incorporated where a proposal may have a direct impact upon transport infrastructure.
- **Trip Assignments and Distribution:** The traffic and transportation implications of the development including consideration of trip generation/attraction, mode choice and trip distribution; as well as an analysis of under construction, permitted and future developments in the area.
- **Cumulative Impact:** The impact of the development on the surrounding road network including analysis of junction's capacity.
- **Parking Strategy:** Description of car and cycle parking requirements and provisions.

2. Policy Framework

2.1 National Policies and Strategies

2.1.1 National Planning Framework

The National Planning Framework (NPF) was published in 2018 and last updated in April 2025. It is the Government's strategic plan for shaping future growth and development in the country. To deliver the NPF vision and the ten National Strategic Outcomes, it is critical to integrate land use and transport planning and promote sustainable transport.

Over a period of 20 years, the National Planning Framework (NPF) provides a central planning policy strategy that guides future development and investment decisions and informs regional strategies and county development plans. The NPF adopts a strategic approach that promotes sustainable land use and transport strategies in both urban and rural areas. The aim of this approach is to reduce emissions, address the necessity of adapting to climate change, and protect the environment and its amenities.

The NPF aims to alleviate the environmental pressure caused by urban sprawl and its negative impact on key infrastructures and facilities. It encourages the development of compact, higher density infill and brownfield sites that are well-served by existing facilities, amenities, and public transport services.

Facilitating smart and sustainable growth within existing settlements can improve the liveability of urban areas. The physical format of urban development affects the public realm, traffic and parking, access to amenities, and public transport.

2.1.2 Spatial Planning and National Roads: Guidelines for Planning Authorities

Spatial Planning and National Roads: Guidelines for Planning Authorities set out planning policy considerations relating to development affecting national primary and secondary roads, including motorways and associated junctions, outside the 50-60 km/h speed limit zones for cities, towns, and villages.

The guidelines aim to facilitate a well-informed, integrated, and consistent approach that affords maximum support for the goal of achieving and maintaining a safe and network of national roads in the broader context of sustainable development strategies, thereby facilitating continued economic growth and development throughout the country.

The following Key Principles have informed these guidelines:

- Land-use and transportation policies are highly interdependent.
- Proper planning is central to ensuring road safety.
- Development should be plan-led.
- Development Management is the key to Plan Implementation.
- Planning Authorities and National Roads Authority and other public transport bodies must work closely together.

2.1.3 Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)

The Guidelines set out policy and guidance in relation to the planning and development of urban and rural settlements, with a focus on sustainable residential development and the creation of compact settlements. They are accompanied by a companion non-statutory Design Manual that illustrates best practice examples of how the policies and objectives of the Guidelines can be applied.

These Guidelines replace the Sustainable Residential Development in Urban Areas Guidelines for Planning Authorities issued as Ministerial guidelines under Section 28 of the Act in 2009, which in turn replaced the Residential Density Guidelines issued in 1999.

They build on and update previous guidance to take account of current Government policy and economic, social, and environmental considerations. There is a renewed focus in the Guidelines on the renewal of existing settlements and on the interaction between residential density, housing standards and quality urban design and placemaking to support sustainable and compact growth.

The policies and objectives set out in the Guidelines are intended as a tool to guide the appropriate scale of development at different locations, rather than as a prescriptive methodology. Flexibility is offered so that planning authorities can operate a plan led approach and take the circumstances of a plan area or a site into account as part of the decision-making process.

2.1.4 National Sustainability Mobility Policy

The National Sustainable Mobility Policy was published on 7 April 2022 by Ireland's Department of Transport, setting out a national strategy operating from 2022 to 2030. Its purpose is to increase the share of sustainable journeys—walking, cycling, shared mobility and public transport—while helping Ireland meet its climate commitments, including achieving a 51% reduction in transport emissions by 2030.

The policy framework covers the full 2022–2030 period and is supported by two action plans: one for 2022–2025 and another for 2026–2030. These plans contain measures relating to public transport investment, active travel infrastructure, road safety, behavioural change, accessibility, and the integration of transport with land-use planning.

The first principle, Safe and Green Mobility, aims to improve safety across walking, cycling and public transport while ensuring that all infrastructure—new or existing—meets high safety standards. It includes actions such as developing pedestrian and cycling network plans, expanding safe active-travel options nationwide, transitioning public transport fleets to low- and zero-emission vehicles, and improving rail infrastructure and services in major cities.

The second principle, People-Focused Mobility, emphasises designing an inclusive and accessible transport system centred on the needs of all users. It promotes a whole-journey approach, ensuring seamless and convenient travel for everyone, including people with disabilities. This principle incorporates universal design across infrastructure, encourages greater citizen engagement, and ensures that planning aligns with national strategies on accessibility and social inclusion.

The third principle, Better Integrated Mobility, focuses on aligning transport planning with land-use planning to support compact growth and reduce reliance on long car journeys. It encourages the adoption of smart mobility tools, data-driven decision-making, and integrated systems to create a more efficient, well-connected and sustainable transport network.

The Sustainable Mobility Policy establishes a long-term pathway for Ireland to transition towards cleaner, safer and more integrated transport choices by 2030, decreasing car dependency and supporting both national climate objectives and balanced regional development.

2.1.5 Cycle Design Manual (2023)

The Cycle Design Manual (CDM) has been prepared by the National Transport Authority (NTA) and overseen by the Department of Transport. It replaces the previous National Cycle Manual, published by the NTA in 2011, which is now withdrawn.

The CDM draws on the experience of delivering cycling infrastructure across Ireland over the last decade, as well as learning from international best practice, and has been guided by the need to deliver safe cycle facilities for people of all ages and abilities.

The new manual places more emphasis on the range of cycles that cycle infrastructure will have to accommodate and the recommendations focus on segregating cyclists from traffic where speeds and volumes make roads unsuitable for sharing. There is also a general presumption towards segregating pedestrians and cyclists where possible.

The CDM includes a number of new types of infrastructure such as protected junctions, Dutch style cycle-friendly roundabouts, and parallel crossings which are commonly used in other countries and will now become an option for cycle infrastructure in Ireland. It should be noted that some newer features will require amendments to supporting Regulations and the Traffic Sign Manual so designers should consult with the relevant approving authority prior to installing any of the newer features to ensure applicability of designs/solutions.

It is intended that this manual will be a live document which will be updated and expanded as required to reflect emerging best practice and feedback from user experience of the manual. For this reason, the latest version of the guidance should always be accessed through the NTA website.

2.1.6 Design Manual for Urban Roads & Streets (DMURS)

The Design Manual for Urban Roads and Streets (DMURS) is Ireland's national guidance document for designing urban roads and streets. Developed by a multidisciplinary team and launched in 2013, DMURS aims to shift the focus from car-centric infrastructure to streets that prioritize people, place-making, and sustainable transport. It is mandatory for all road authorities in Ireland when designing or upgrading urban roads.

DMURS promotes streets as vibrant public spaces that support walking, cycling, and public transport, contributing to healthier lifestyles and reduced emissions. It encourages collaborative design among planners, engineers, architects, and other professionals to create safe, attractive, and inclusive environments for all users.

DMURS is structured into five main chapters, each addressing a key aspect of urban street design. According to the official publication:

Introduction: Sets the context for DMURS, emphasizing a shift in design philosophy. It outlines the policy background and the manual's application across urban areas.

Re-examining the Street: Discusses the need for change in street design, highlighting the negative impacts of car dominance and advocating for a balanced approach that considers both movement and place. It introduces user priorities and the concept of streets as social spaces 2.

Street Networks: Focuses on creating integrated, permeable, and legible street networks. It covers movement functions, place contexts, block sizes, retrofitting, and traffic management strategies including congestion, bus services, and pollution control.

Street Design: Provides detailed guidance on designing individual streets. Topics include speed management, streetscape elements (trees, signage, furniture), pedestrian and cyclist infrastructure, and carriageway conditions. It also addresses historic contexts and materials selection 2.

Design Process provides a structured approach for implementing the principles and standards outlined in the previous chapters. This chapter is essential for ensuring that street design is not only technically sound but also context-sensitive and inclusive.

2.2 Regional Policies and Strategies

2.2.1 Eastern and Midland Regional Spatial and Economic Strategy (RSES) 2019-2031

The elected members of the Eastern and Midland Regional Assembly (EMRA) agreed to make the Regional Spatial and Economic Strategy (RSES) 2019-2031, on June 28th, 2019.

The RSES is a strategic plan which identifies regional assets, opportunities and pressures and provides appropriate policy responses in the form of Regional Policy Objectives. At this strategic level it provides a framework for investment to better manage spatial planning and economic development to sustainably grow the Region to 2031 and beyond. The RSES provides a:

- **Spatial Strategy:** to manage future growth and ensure the creation of healthy and attractive places to live, work, study, visit and invest in.
- **Economic Strategy:** that builds on our strengths to sustain a strong economy and support the creation of quality jobs that ensure a good living standard for all.
- **Metropolitan Plan:** to ensure a supply of strategic development areas for the sustainable growth and continued success and competitiveness of the Dublin Metropolitan Area.
- **Investment Framework:** to prioritise the delivery of key enabling infrastructure and services by government and state agencies.
- **Climate Action Strategy:** to accelerate climate action, ensure a clean and healthy environment and to promote sustainable transport and strategic green infrastructure.

The principal statutory purpose of the RSES is to support the implementation of Project Ireland 2040 – National Planning Framework and National Development Plan 2019-2027 and the economic policies of the Government by providing a long-term strategic planning and economic framework for the development of the Regions.

The RSES will be implemented by way of a review by local authorities of all development plans and Local Economic and Community Plans (LECPs). Key state agencies and sectoral bodies will also consider their strategies and investment plans, post adoption of RSES, to support the achievement of National and Regional Strategic Outcomes set out in the NPF and RSES.

2.2.2 Greater Dublin Area Transport Strategy 2022-2042

The National Transport Authority has prepared and published the Transport Strategy for the Greater Dublin Area, 2022-2042 in accordance with Section 12 of the Dublin Transport Authority Act, 2008.

The strategy details the transportation development across the region, including Dublin, Meath, Wicklow, and Kildare, over the strategy period. It has received approval from the Minister for Transport in accordance with relevant legislation.

The strategy addresses challenges related to population growth, urbanization, and climate change. It presents four objectives: promoting walking, cycling, and public transport as alternatives to private car use for sustainable mobility; developing seamless connections between different transport modes for integrated networks; prioritizing low-carbon and environmentally friendly solutions for climate action; and aligning transport development with land-use planning for spatial planning and accessibility.

The strategy proposes measures to ensure equitable access to transport services. These measures include enhancing public transport services (bus, tram, rail), expanding cycling infrastructure and bike-sharing programs, improving pedestrian facilities, upgrading roads, and developing park-and-ride facilities, and implementing smart mobility solutions.

The strategy acknowledges the significance of land use and transport planning in shaping people's travel choices. It advocates the use of local land use planning principles, such as promoting walking, cycling, and public transport by maximizing high-density residential development near local amenities, schools, and public transport.

In addition, the strategy sets out the requirements for new developments to prioritise walking, cycling and public transport and discourage the use of the private car. Maximum parking standards should be set for all new developments based on the level of public transport accessibility. The strategy therefore recommends that walking and cycling facilities should be easily accessible and retrofitted where practical.

2.2.3 New Dublin Area Bus Network

Following three rounds of public consultation which began in 2017, the National Transport Authority (NTA) published, in September 2020, the new Dublin Area bus network. This new bus network plan is the final version resulting from previous redesign proposals and with consideration given to issues raised by 72,000 submissions. The implementation of the New Network will take place on a phased basis over a number of years starting in 2021, subject to Government funding.

The new Dublin Area bus network will provide a more coherently planned, higher ability, more understandable network, delivering a better overall bus system for the Dublin region. It will consist of spines radiating from the city centre. Spines are very frequent routes made up of individual bus services timetabled to work together along a corridor. At the end of the corridor, the individual services branch off to serve different areas. The network will also include orbitals across the North, West and South areas of Dublin, added local area services, peak only and express services.

The new network will see increased evening and weekend services, with most frequent routes operating every 15 minutes or better on weekdays and Saturdays, most on Sundays also. There will be a number of routes that will run 24 hours a day. These services will operate throughout the night to support the night-time economy across Dublin. Overall, the level of bus services in the Dublin network will increase by 23% as a result of the new network. Other benefits of the New Network include:

- A 23% overall increase in bus services.
- Increased capacity, particularly for all day services.
- A more easily understood city network.
- Better access to bus services for passengers.
- New connections to schools, hospitals, and other essential services.

2.2.4 Greater Dublin Area Cycle Network Plan (2022)

The Greater Dublin Area Cycle Network Plan sets out a strategy to expand the urban cycle network, links cities and towns of over 5,000 people with a safe, connected and inviting cycle network. The proposed cycle network of approximately 3,500km will connect over 200 settlements and 2.8 million people. The network will consist of primary routes (serving the highest demand), secondary and feeder routes (Forecast to have lower demand) as well as Greenway routes (through parks, along waterways etc.)

The Plan will provide many benefits for cyclists and communities across Ireland, including:

- Ensuring delivery of a high-quality cycle network which will promote safety, comfort, and increased participation in cycling.
- Improving sustainable connectivity nationally and providing links with other networks such as CycleConnects, EuroVelo and Northern Ireland networks.
- Supporting both urban and rural economies through increased leisure and tourism cycling.
- Improving public health through well documented benefits of active travel.

- Guiding how local authorities prioritise exchequer-funded investments in cycle infrastructure.
- Making use of existing infrastructure wherever possible including greenways, road infrastructure, and declassified roads where safe and inviting cycle experiences can be provided.

2.3 Local Plans and Strategies

2.3.1 The Dublin City Development Plan 2022-2028

The Dublin City Development Plan 2022-2028 sets out the authority's policies and objectives for the development of the County for the indicated period. The Plan seeks to develop and improve in a sustainable manner the social, economic, cultural and environments assets of the county. The Section 8 Sustainable Movement and Transport indicate:

"Sustainable and efficient movement of people and goods is crucial for the success and vitality of the city. It is important that we transition away from the private car and fossil fuel-based mobility to mitigate against the negative impacts of transport and climate change (...) This plan seeks to promote ease of movement within and around the city as well as playing a key role in safeguarding the environment and adapting to the impacts of climate change. This 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. (...)"

In the context of the subject development site and the proposed residential scheme a few of most relevant policies include:

(1) Addressing Climate Change through Sustainable Mobility

"SMT1 – Modal Shift and Compact Growth: To continue to promote modal shift from private car use towards increased use of more sustainable forms of transport such as active mobility and public transport, and to work with the National Transport Authority (NTA), Transport Infrastructure Ireland (TII) and other transport agencies in progressing an integrated set of transport objectives to achieve compact growth."

"SMT2 – Decarbonising Transport: To support the decarbonising of motorised transport and facilitate the rollout of alternative low emission fuel infrastructure, prioritising electric vehicle (EV) infrastructure."

"SMT01 – Transition to More Sustainable Travel Modes: To achieve and monitor a transition to more sustainable travel modes including walking, cycling and public transport over the lifetime of the development plan, in line with the city mode share targets of 26% walking/cycling/micro mobility; 57% public transport (bus/rail/Luas); and 17% private (car/van/HGV/motorcycle)."

(2) Effective Integration of Land use and Transportation

"SMT3 – Integrated Transport Network: To support and promote the sustainability principles set out in National and Regional documents to ensure the creation of an integrated transport network that services the needs of communities and businesses of Dublin City and the region."

"SMT4 – Integration of Public Transport Services and Development: To support and encourage intensification and mixed-use development along public transport corridors and to ensure the integration of high-quality permeability links and public realm in tandem with the delivery of public transport services, to create attractive, liveable and high-quality urban places."

(3) Mobility Management and Travel Planning

"SMT6 – Mobility Management and Travel Planning: To promote best practice mobility management and travel planning through the requirement for proactive mobility strategies for new developments

focussed on promoting and providing for active travel and public transport use while managing vehicular traffic and servicing activity.”

“SMT7 – Travel Plans for New and Existing Developments: To require the preparation and submission of travel plans for new and existing developments as part of the planning application process including residential, school, workplace etc.”

(4) Public Realm, Place Making and Healthy Streets

“SMT8 – Public Realm Enhancements: To support public realm enhancements that contribute to place making and liveability and which prioritise pedestrians in accordance with Dublin City Council's Public Realm Strategy ('Your City – Your Space'), the Public Realm Masterplan for the City Core (The Heart of the City), the Grafton Street Quarter Public Realm Plan and forthcoming public realm plans such as those for the Parnell Square Cultural Quarter Development and the City Markets Area.”

(5) City Centre and Urban Villages- Access and Functional Needs

“SMT12 – Pedestrians and Public Realm: To enhance the attractiveness and liveability of the city through the continued reallocation of space to pedestrians and public realm to provide a safe and comfortable street environment for pedestrians of all ages and abilities.”

(6) Sustainable Modes

“SMT16 – Walking, Cycling and Active Travel: To prioritise the development of safe and connected walking and cycling facilities and prioritise a shift to active travel for people of all ages and abilities, in line with the city's mode share targets.”

“SMT18 – The Pedestrian Environment: To continue to maintain and improve the pedestrian environment and strengthen permeability by promoting the development of a network of pedestrian routes including laneway connections which link residential areas with recreational, educational and employment destinations to create a pedestrian environment that is safe, accessible to all in accordance with best accessibility practice.”

“SMT19 – Integration of Active Travel with Public Transport: To work with the relevant transport providers, agencies and stakeholders to facilitate the integration of active travel (walking/cycling etc.) with public transport, ensuring ease of access for all.”

“SMT09 – Greater Dublin Area Cycle Network Plan: To support the development of a connected cycling network in the City through the implementation of the NTA's Greater Dublin Area Cycle Network Plan, subject to environmental assessment and route feasibility.”

“SMT012 – Cycle Parking Spaces: To provide publicly accessible cycle parking spaces, both standard bicycle spaces and non-standard for adapted and cargo bikes, in the city centre and the urban villages, and near the entrance to all publicly accessible buildings such as schools, hotels, libraries, theatres, churches etc. as required.”

“SMT22 – Key Sustainable Transport Projects: To support the expeditious delivery of key sustainable transport projects so as to provide an integrated public transport network with efficient interchange between transport modes, serving the existing and future needs of the city and region and to support the integration of existing public transport infrastructure with other transport modes. In particular the following projects subject to environmental requirements and appropriate planning consents being obtained: DART +, Metrolink from Charlemount to Swords, BusConnects Core Bus Corridor projects, Delivery of Luas to Finglas, and Progress and delivery of Luas to Poolbeg and Lucan.”

“SMT018 – Bus Infrastructure: DCC will work with the NTA to incorporate bus infrastructure within new large-scale developments where appropriate.”

“SMT019 – ‘Park and Ride’ Services: To promote ‘Park and Ride’ services at suitable locations in co-operation with neighbouring local authorities and to support the implementation of the NTA’s Park and Ride Strategy for the Greater Dublin Area.”

(7) Car Parking

“SMT25 – On-Street Parking: To manage on-street car parking to serve the needs of the city alongside the needs of residents, visitors, businesses, kerbside activity and accessible parking requirements, and to facilitate the re-organisation and loss of spaces to serve sustainable development targets such as in relation to, sustainable transport provision, greening initiatives, sustainable urban drainage, access to new developments, or public realm improvements.”

2.3.2 Ballymun Local Area Plan 2017

Ballymun Local Area Plan was adopted at a City Council meeting on 2nd October 2017, thereafter, coming into effect four weeks from that date, on the 27th of October 2017. The plan provides a statutory land use framework to guide the development of vacant lands in Ballymun.

In October 2022, the Elected Members of Dublin City Council resolved to extend the Ballymun Local Area Plan 2017, for a further period of five years. Having considered Report No. 236/2022, the City Council and in accordance with the provisions of Section 19 and 20 of the Planning and Development Act, 2000 (as amended), the members approved the extension of the Ballymun Local Area Plan, until October 2027.

The Local Area Plan sets out an agreed vision and a series of high-level principles that translate into objectives and site briefs for the vacant lands. The overall vision for the LAP is stated as: *“to create a successful and sustainable new town, which provides for and supports a thriving local economy, which caters for people across all spectrums of their lifecycle in both their house type and tenure and where communities are supported by the appropriate social, sporting and cultural amenities”*

The Local Area Plan identifies the following key objectives for the movement:

“MO1: Complete the outstanding pieces of road infrastructure required to enhance connectivity and to service the remaining development sites. All new road schemes will be delivered in accordance with the Principles of Road Development set out in the NTA’s ‘Transport Strategy for the Greater Dublin Area 2016-2035’ (reference Section 5.8.3 of NTA Strategy).”

“MO2: Work with Fingal County Council and the NTA to ensure the provision of a high-quality rail transport system (Metro North) is delivered through Ballymun. In order to protect the character of the merging Main Street the LAP is seeking that the future Metro line respects the desire for enhanced permeability, with the line ideally run underground until the junction with Santry Avenue. Future realignment of the Main Street should also provide for enhanced and segregated cycle facilities.”

“MO3: Facilitate the delivery of a core bus corridor through Ballymun as proposed in the NTA transport strategy.”

“MO4: Work with the NTA to ensure that the recommendations of the bus network review are implemented in Ballymun, in particular seeking a new connection between Ballymun and Dublin Airport.”

“MO5: Ensure all new developments are designed with permeability in mind.”

“MO7: Explore the provision of a cycle lane on Santry Avenue in tandem with the NTA ‘Bus Network Review’.”

“MO8: Explore the potential of a multi-storey car park near Main Street as part of a sustainable travel strategy.”

3. Receiving Environment

3.1 Land use

Dublin City Development Plan 2022-2028 sets out the land use categories. Map B of the mentioned development plan indicates that the subject site is situated within Zone Z1.

Zone Z1: Sustainable Residential Neighbourhoods: *The vision for residential development in the city is one where a wide range of high-quality accommodation is available within sustainable communities, where residents are within easy reach of open space and amenities as well as facilities such as shops, education, leisure and community services. The objective is to ensure that adequate public transport, in conjunction with enhanced pedestrian and cycling infrastructure, provides such residential communities good access to employment, the city centre and the key urban villages in order to align with the principles of the 15-minute city.*

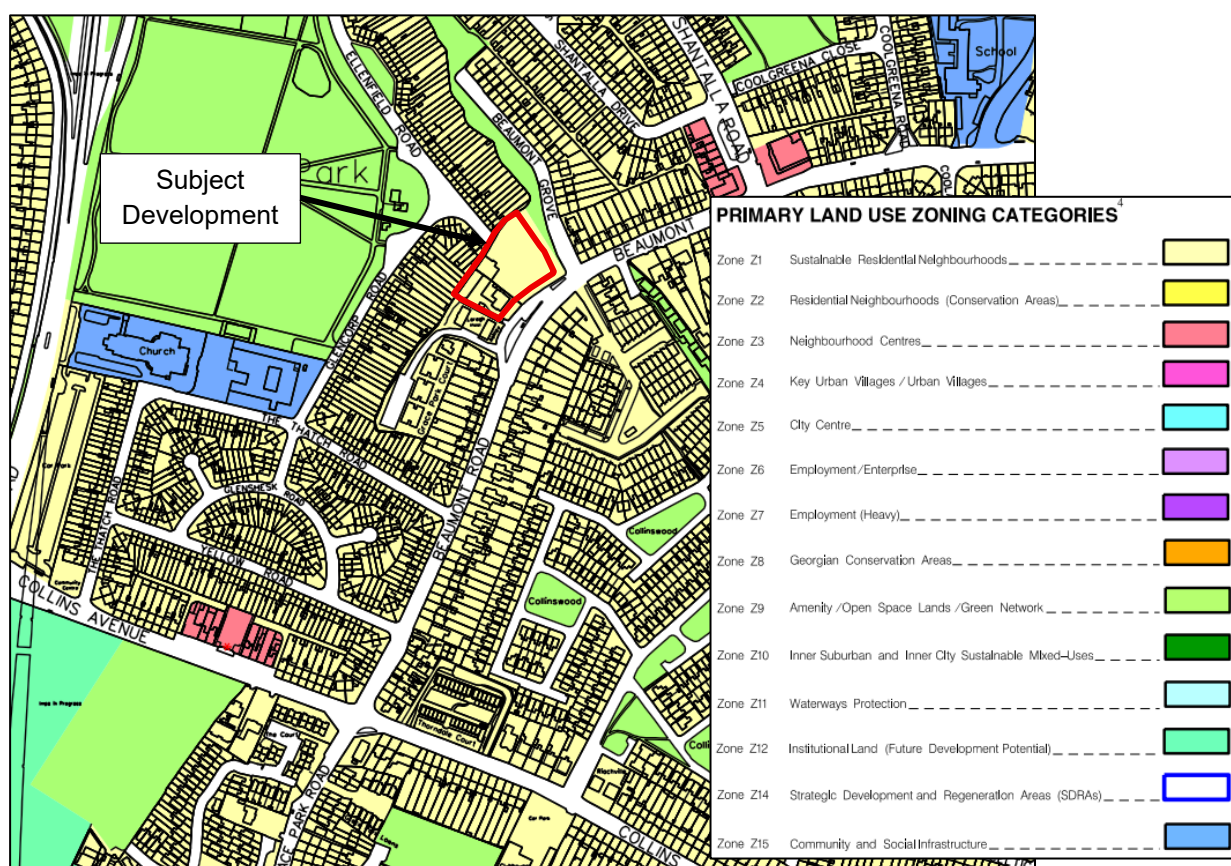


Figure 2 | Site Location and Zoning

(Source: Map B - Dublin City Development Plan 2022-2028)

3.2 Site Location and Description

The Subject Site is located at Beaumont Road, Beaumont, Dublin 9. Refer to **Figure 3**.

The site is approximately 0.58 hectares.

The subject site is bounded by the Beaumont Grove Road to the northeast, by the Grace Park Court and Beaumont Road to the southeast and by Grace Park Court to the southwest and existing neighbouring houses to the north and west.

The location of the site is shown in **Figure 3**.



Figure 3 | Site Location
(Source: Google Earth)

3.3 Existing Roads and Junctions

3.3.1 Roads

Figure 4 below shows the main road around the subject development.

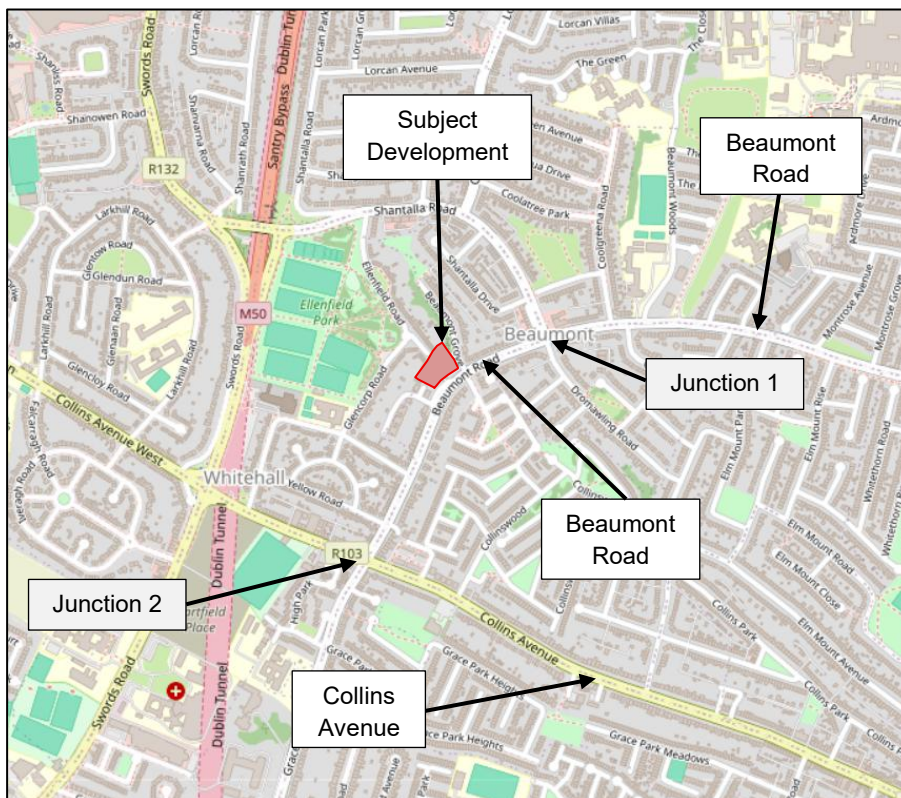


Figure 4 | Existing Road Network

The subject site will be accessed from **Beaumont Road**. Beaumont Road single carriageway road that runs through a residential area. It has a posted speed limit of 30 km/hr. There are dedicated cycle lanes and pedestrian footpaths on both sides of the carriageway.

Beaumont Grove is a residential cul-de-sac off Beaumont Road. It provides access to residential developments located northeast of the subject site. It has footpaths on both sides of the carriageway.

Collins Avenue (R103) is a regional single carriageway road. It runs north of Dublin city centre through Whitehall and Donnycarney. It is well served by Dublin Bus routes with frequent services to the city centre and local areas. Major roads like the M1, M50, Swords Road, Malahide Road, and Port Tunnel are easily accessible, making it convenient for commuting. There are no dedicated cycling facilities along road. However, there are dedicated pedestrian footpaths on both sides of the carriageway.

3.3.2 Junctions

The main junctions in the local area are shown in **Figure 4** above and described as follow:

- **Junction 1:** is an existing signal-controlled junction located at the intersection of Shantalla Road, Beaumont Road and Dromawling Road
- **Junction 2:** is an existing signal-controlled junction located at the intersection of the R103, Beaumont Road and Grace Park Road.

3.4 Existing Traffic condition

To quantify the volumes of traffic movements at the key junctions, traffic flow data for the main junction were requested from the Intelligent Transportation Systems, Transportation and Public Realm Department of Dublin City Council.

The information received indicates that peak hours at Junction 1 occur between 07:30 and 08:30 for the AM peak and between 16:30 and 17:30 for the PM peak. For Junction 2, the peak hours occur between 09:00 and 10:00 and between 14:30 and 15:30, respectively.

The two-way flows recorded at each junction during the morning and evening peak hours are shown in **Table 2** below.

Junction	AM Peak Hour	PM Peak Hour
1	1134	1119
2	1707	1703

Table 2 | 2026 Surveyed Two-way Flows per Junction

The figure below illustrates the information received from DCC. The full report is included in **Appendix C**.

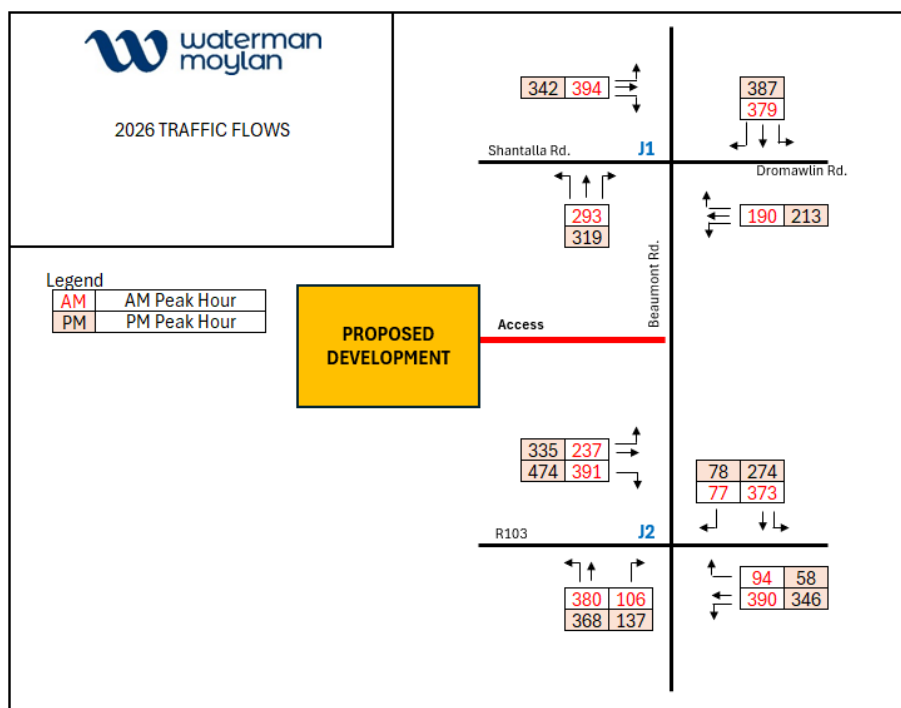


Figure 5 | 2026 Traffic Flows

3.5 Multi-modal access to the site

3.5.1 Pedestrian Infrastructure and Walking Accessibility

In the immediate vicinity of the subject development, there are footpaths on both sides of the carriageway along Beaumont Road.

To provide an indication of the catchment areas associated with the Subject Site, reference from the “*Guidelines for Providing for Journeys on Foot*” published by the *Institution of Highways & Transportation* in 2000, have been taken. This guideline indicates that acceptable walking distances vary between individuals and circumstances. These include an individual's fitness, physical ability, and personal motivation; the size of the city itself and the quality of the surrounding footpath network. Furthermore, the document proposes walking distances and times based on an average walking speed of 1.4 metres per second (approximately 400 metres in five minutes). **Table 3** below provides a summary of these suggestions.

	Town Centre	Commuting / School / Sight-seeing	Elsewhere
Desirable	200m (2.5 minutes)	500m (6 minutes)	400m (5 minutes)
Acceptable	400m (5 minutes)	1,000m (12 minutes)	800m (10 minutes)
Preferred Maximum	800m (10 minutes)	2,000m (24 minutes)	1,200m (15 minutes)

Table 3 | Ideal Walking Distances (Source: *Guidelines for Providing for Journeys on Foot*)

Figure 6 below shows the considerable extent of the pedestrian catchment areas accessible from the subject development, for different walking times, namely 10 minutes, 15 minutes, and 24 minutes.

The subject development is well connected to surrounding areas via pedestrian infrastructure. A 24-minute walk provides access to a range of amenities, including healthcare facilities such as Beaumont Hospital;

educational facilities such as St. David's Boys National School and St. David's College, Artane; grocery stores including Centra, Tesco and Lidl; and retail destinations such as Omni Shopping Centre and Artane Castle Shopping Centre, as illustrated in **Figure 6**.

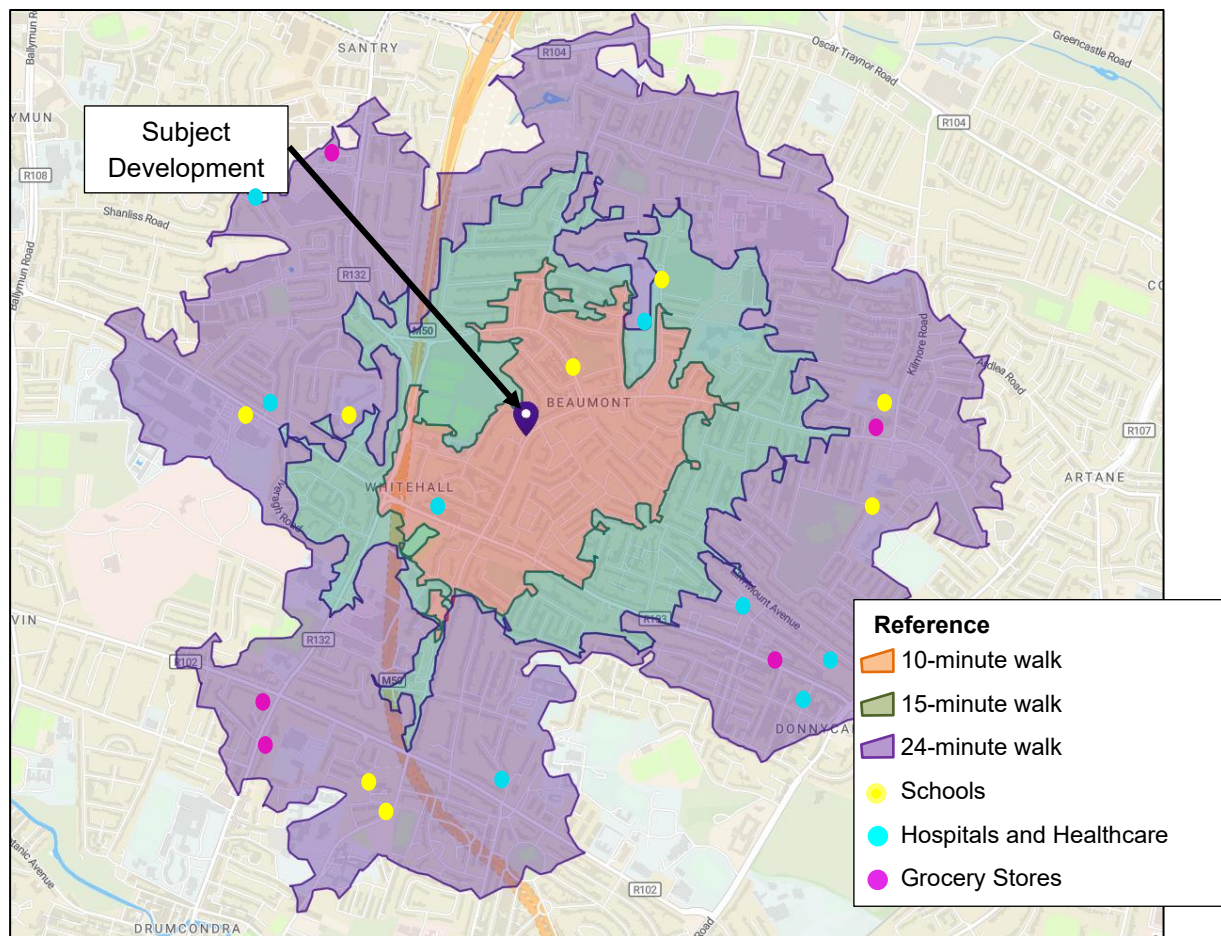


Figure 6 | Isochrone map indicating Walking Accessibility (Source: Smappen)

3.5.2 Cycle Infrastructure and Cycling Accessibility

In the immediate vicinity of the subject development, there are cycle lanes on both sides of the carriageway along Beaumont Road.

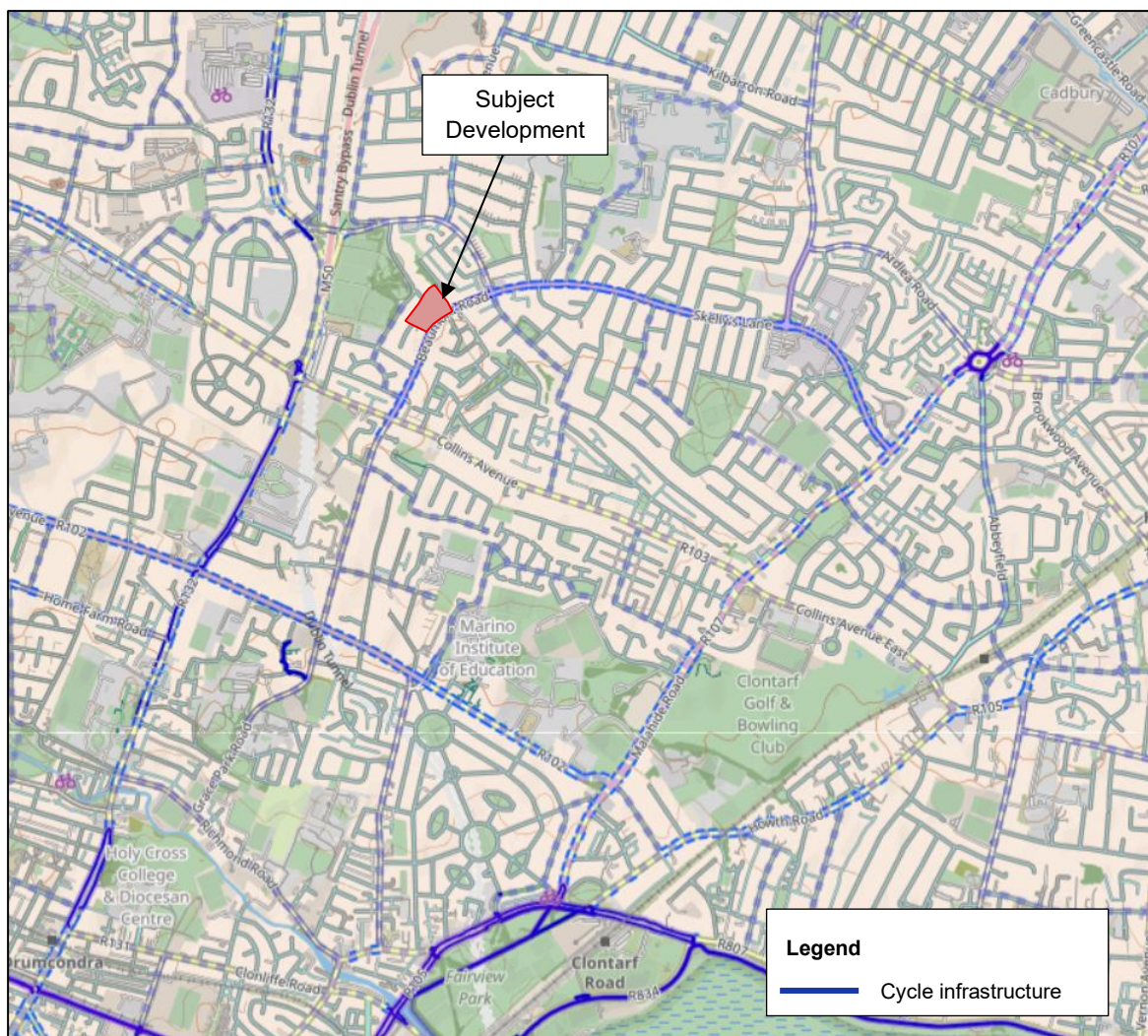


Figure 7 | Existing cycling infrastructure (Source: Open Street Map)

A similar catchment exercise has been conducted for the cycling mode of transport, in accordance with the methodology previously employed for walking. The average cycling speed was calculated to be 3.3 metres per second (equivalent to 15 kilometres per hour). **Figure 8** below indicates the typical cycling catchments from the subject site for 10-minute, 15-minute, and 24-minute cycling times.

The subject development is well connected to surrounding areas via cycling infrastructure. A 24-minute walk provides access to a range of amenities, including healthcare facilities such as Beaumont Hospital; educational facilities such as St. David's Boys National School and St. David's College, Artane; grocery stores including Centra, Tesco and Lidl; retail destinations such as Omni Shopping Centre and Artane Castle Shopping Centre; public transport links including Killester, Connolly and Clontarf DART stations; and employment hubs such as Eastpoint Business Park, Jamestown Business Park and Port Tunnel Business Park, as illustrated in **Figure 8**.

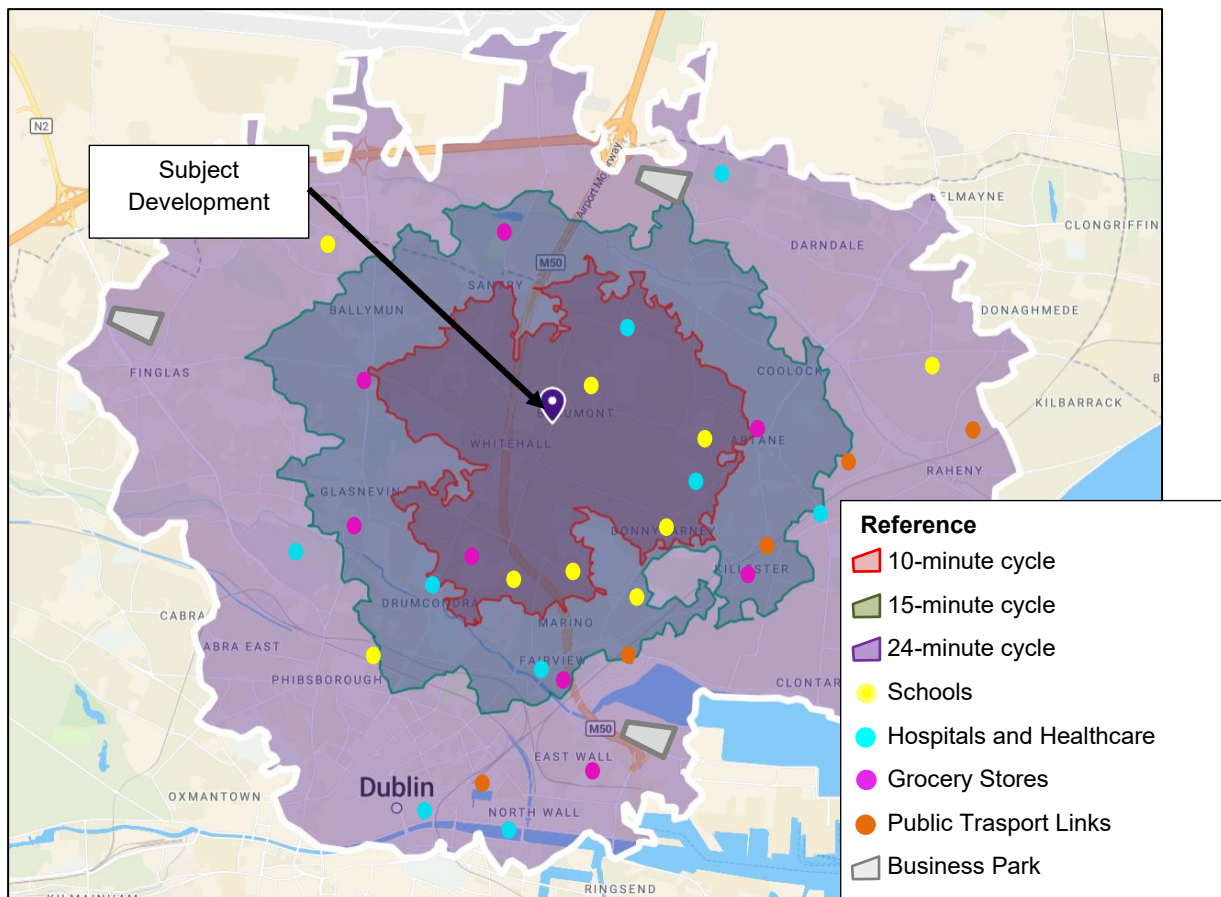


Figure 8 | Isochrone map indicating Cycling Accessibility (Source: Smappen)

3.5.3 Bus Network

The nearest bus stops to the site are located on Beaumont Road. The closest stop is immediately adjacent to the subject development, with additional stops approximately 150 m (2-minute walk) from the site. These stops are served by bus routes 14 and 16.

The subject site is located approximately 550m (8-minute walk), from the N1/Swords Road, which is a Quality Bus Corridor (QBC), that is served by additional bus routes.

The location of the bus routes and walking distances is shown in **Figure 9** below.

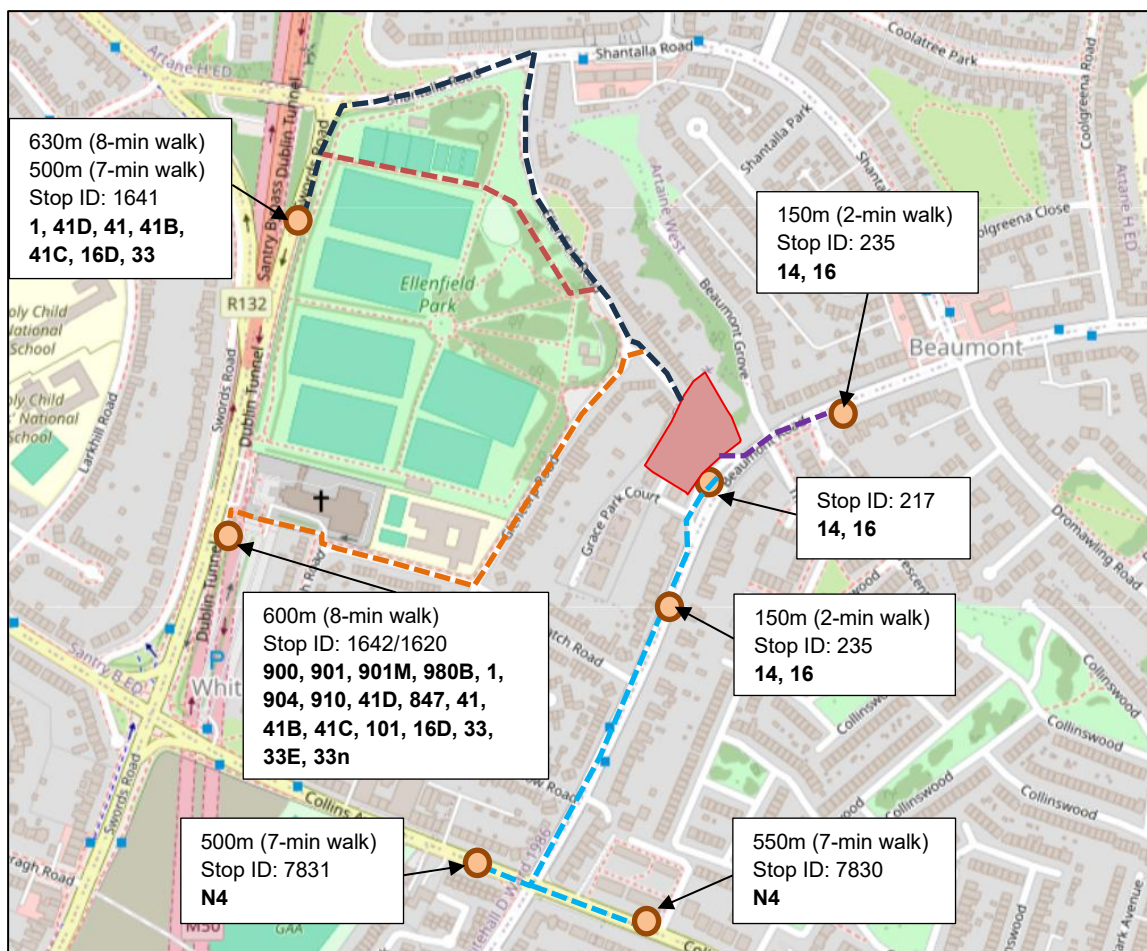


Figure 9 | Location of Closest Bus Stops and Walking Routes from the Site

A summary of the frequency of these bus routes is shown in **Table 4** below, where the hours indicate the time when the buses pass at the mentioned bus stop.

Route	Direction	Weekday Frequency
14	From: Ardlea Rd. (Beaumont) To: Dundrum Luas Stn.	Every 15 minutes between 6:30 and 7:00, between 8:30 to 9:30, and between 18:30 and 23:30. Every 10 minutes between 7:00 and 8:30. Every 12 minutes between 9:30 and 18:30.
	From: Dundrum Luas Stn. To: Ardlea Rd. (Beaumont)	
16	From: Dublin Airport To: Ballinteer	Every 15 minutes between 6:00 and 7:00, between 8:30 to 9:30, and between 19:30 and 23:30. Every 10-12 minutes between 9:00 and 19:30.
	From: Ballinteer To: Dublin Airport	
N4	From: Point Village To: Blanchardstown	Every 12 minutes between 5:30 and 23:30 Every 30 minutes between 20:30 and 5:30
	From: Blanchardstown To: Point Village	
1	From: Santry (Shanard Road) To: Pearse Street (Shaw Street)	Every 10-12 minutes between 5:30 and 19:20 Every 20 minutes between 19:20 and 23:30
	From: Pearse Street (Shaw Street) To: Santry (Shanard Road)	

16D	From: Airport To: Ballinteer not via Beaumont Village	6 per day at intervals of 20 minutes between 7.10 and 8.50
33	From: Balbriggan To: Lower Abbey St. From: Lower Abbey St. To: Balbriggan	13 services per day
41	From: Swords Manor To: Lower Abbey Street From: Lower Abbey Street To: Swords Manor	Every 15-20 minutes between 6:00 and 20:00 Every 30 minutes between 20:00 and 6:00
41b	From: Rolestown To: Lower Abbey Street From: Lower Abbey Street To: Rolestown	4 services per day
41c	From: Swords Manor Via River Valley To: Lower Abbey Street To: Swords Manor Via River Valley From: Lower Abbey Street	Every 15-20 minutes between 6:30 and 20:15 Every 30 minutes between 20:15 and 23:15
41d	From: Swords Business Park To: Lower Abbey Street From: Lower Abbey Street To: Swords Business Park	2 services per day
44	From: Enniskerry To: DCU From: DCU To: Enniskerry	Every 60 minutes between 6:35 and 23:30
101	From: Drogheda To: Dublin (via Airport) From: Dublin To: Drogheda (via Airport)	Every 20 minutes between 6:00 and 8:00, between 13:00 and 17:30 Every 30 minutes between 8:00 and 13:00, between 17:30 and 18:30 Every 60 minutes between 20:00 and 6:00
900	From: Dublin To: Dundalk From: Dundalk To: Dublin	Every 30 minutes between 7:30 and 18:30 Every 30 minutes between 5:00 and 17:00
901	From: Dublin To: Drogheda (via Dundalk) From: Drogheda To: Dublin (via Dundalk)	Every 30 minutes between 6:30 and 19:30 Every 60 minutes between 19:30 and 23:30 Every 30 minutes between 5:30 and 10:00 Every 60 minutes between 10:00 and 21:00
910	From: Dublin To: Bettystown (via Laytown) From: Bettystown To: Dublin (via Laytown)	6 services per day

Table 4 | Bus Services

(Source: Transport for Ireland)

3.5.4 Nearest Car Sharing Facilities (GoCar)

The site is located in close proximity to various alternative Go-Car facilities which are less within a 10-minute walking catchment from the subject site. The location of these Go-Car facilities is shown in **Figure 10**.

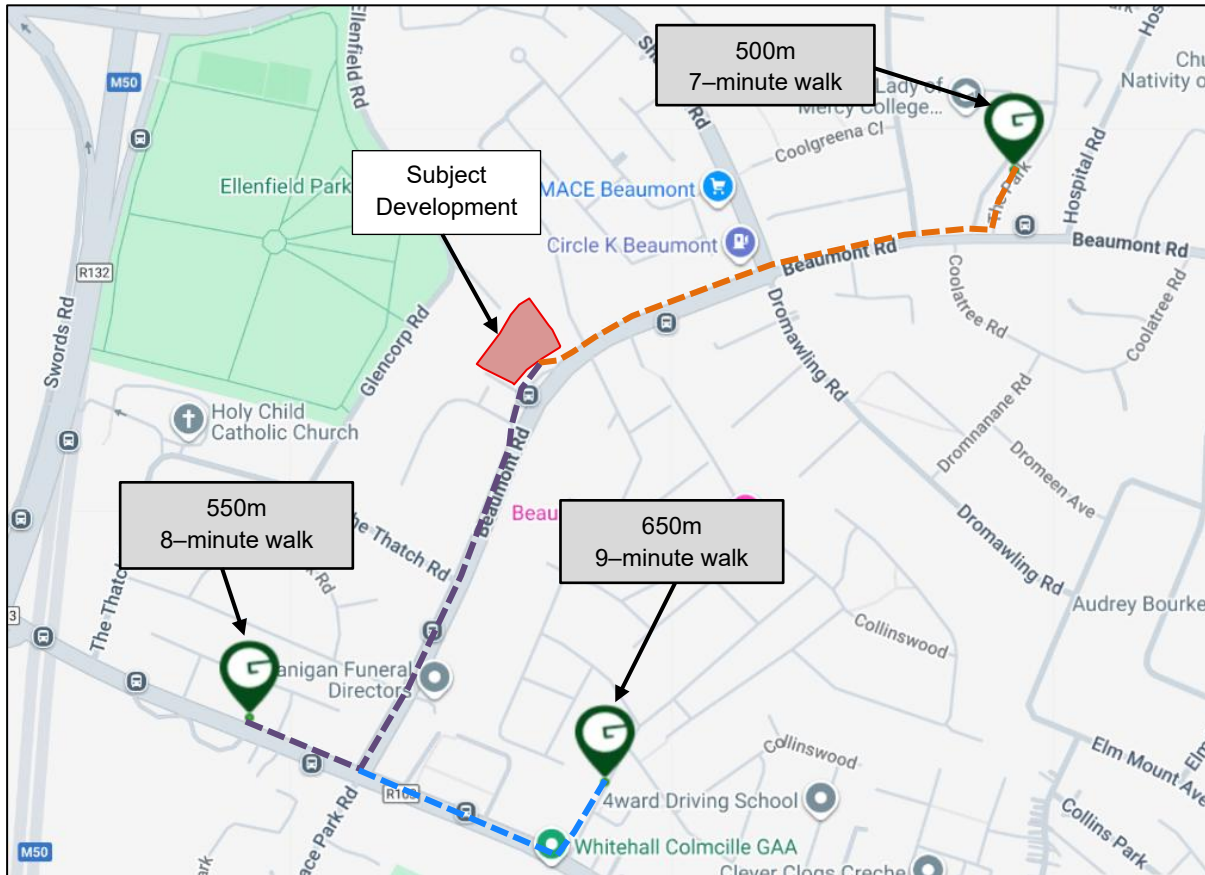


Figure 10 | Location of the Nearest GoCar Stations

The subject site will benefit from the Go-Car scheme with an allocated Go-Car parking space immediately adjacent to the subject development's access. It is intended to provide the car club space off the public road so that it is available for use by residents in the wider area. The applicant will engage with suitable car share schemes regarding the provision of a car club space within the development when/if planning permission is received.

4. Transportation improvements

4.1 Cycling facilities

In January 2023 the Greater Dublin Area (GDA) Cycle Network Plan was adopted, consisting of the Urban Network, Inter-Urban Network and Green Route Network for each of the seven Local Authority areas comprising the GDA. This Plan was part of the GDA Transport Strategy 2022-2042.

An extract of the proposed cycle network is reproduced in **Figure 11** below.

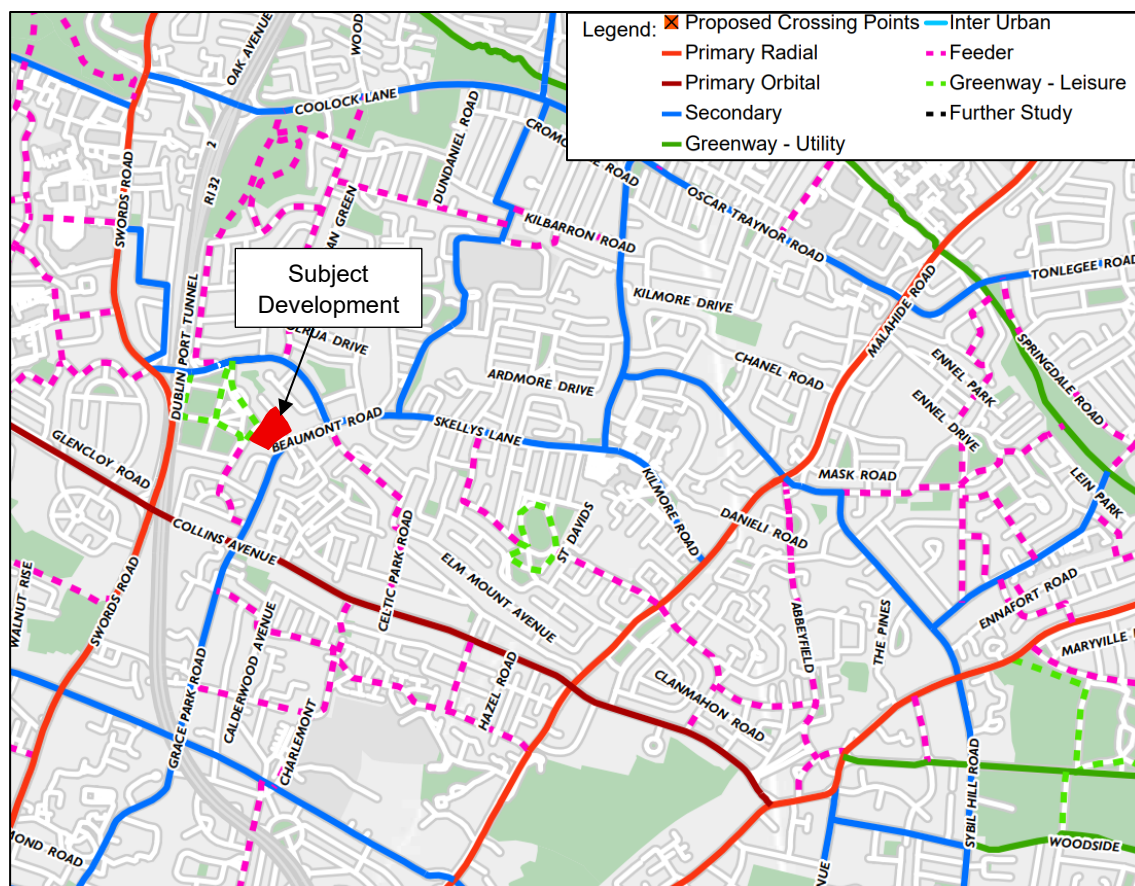


Figure 11 | Proposed Cycle Network (Source: GDA Cycle Network Plan, 2022)

The future local cycle network, as outlined in the 2022 GDA Cycle Network Plan, includes a west-east primary orbital route running along Collins Avenue (R103), which provides access to Whitehall and Donnycarney areas.

4.2 BusConnects

The BusConnects project, currently being promoted by the National Transport Authority (NTA), aims to deliver a significantly improved bus service in the Greater Dublin Area (GDA). Some of the route improvements identified in the BusConnects plan are already in place or underway. According to BusConnects the above route types can be defined as follows:

Spines routes: are very frequent routes made up of individual bus services that are timetabled to work together over their common sections.

Radials routes: are other services that operate into Dublin city centre. These services are not part of any Spine and operate to their own timetable.

Orbitals routes: provide connections between suburbs, without having to travel into the city centre.

Local routes: provide connections to Local centres and link to onward transport connections.

Peak routes operate during peak travel periods, providing additional capacity along key bus corridors. Express routes are direct services from outer suburbs to the city centre during peak hours, serving limited stops to get passengers to their destination faster.

The routes proposed to serve the surrounding area of the Subject Development are shown in **Table 5** below, which also gives the route name and weekday and weekend frequency, and the map showing the location of each bus route is shown in **Figure 12** below. The subject development is proposed to be served by all of the A-Spine routes as well as a couple of routes that operate in Beaumont Road.

It is worth noting that that route N4 is currently operational along Collins Avenue as outlined in Section 3.4.1 above.

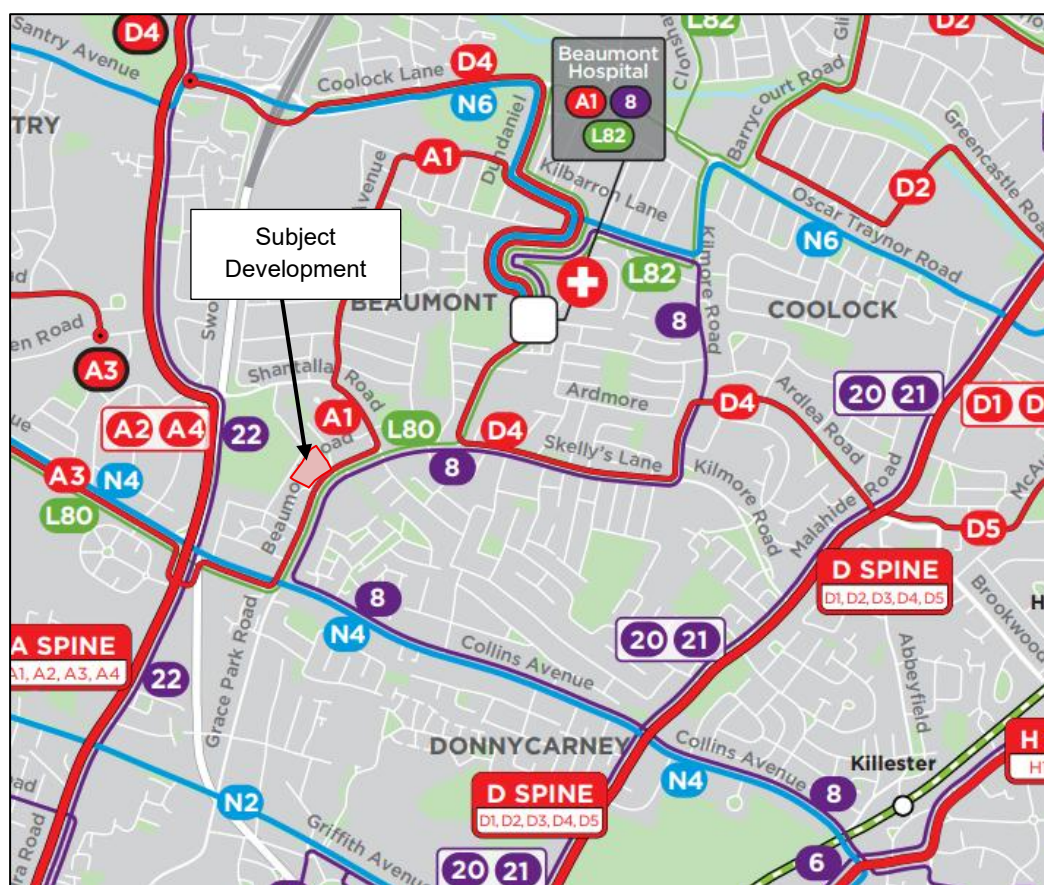


Figure 12 | BusConnects Route Map – extracted from BusConnects Revised Network Map 2023

Route No.	Destination	Frequency		
		Weekday	Saturday	Sunday
A1	Beaumont-City Centre-Knocklyon	Every 30 minutes between 05:00 and 06:00	Every 20 minutes between 06:00 and 09:00	Every 30 minutes between 08:00 and 10:00
		Every 12-15 minutes between 06:00 and 23:00	Every 30 minutes between 09:00 and 19:00	Every 20 Minutes between 10:00 and 19:00
		Every 30 minutes between 23:00 and 00:00	Every 20 Minutes between 19:00 and 23:00	Every 30 minutes between 19:00 and 00:00
			Every 30 minutes between 23:00 and 00:00	

A2	Airport-City Centre- Ballinteer- Dundrum	Every 30 minutes between 05:00 and 06:00 Every 12-15 minutes between 06:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 20 minutes between 06:00 and 09:00 Every 30 minutes between 09:00 and 19:00 Every 20 Minutes between 19:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 30 minutes between 08:00 and 10:00 Every 20 Minutes between 10:00 and 19:00 Every 30 minutes between 19:00 and 00:00
A3	DCU-City Centre-Tallaght	Every 30 minutes between 05:00 and 06:00 Every 12-15 minutes between 06:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 20 minutes between 06:00 and 09:00 Every 30 minutes between 09:00 and 19:00 Every 20 Minutes between 19:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 30 minutes between 08:00 and 10:00 Every 20 Minutes between 10:00 and 19:00 Every 30 minutes between 19:00 and 00:00
A4	Swords-City Centre-Dundrum	Every 30 minutes between 05:00 and 06:00 Every 12-15 minutes between 06:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 20 minutes between 06:00 and 09:00 Every 30 minutes between 09:00 and 19:00 Every 20 Minutes between 19:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 30 minutes between 08:00 and 10:00 Every 20 Minutes between 10:00 and 19:00 Every 30 minutes between 19:00 and 00:00
L80	Clongriffin- Beaumont Hospital-DCU	Every 20-40 minutes	Every 60 minutes	Every 60 minutes
8	Beaumont Hospital- Clontarf-Abbey Street	Every 60 minutes	Every 60 minutes	Every 60 minutes
22	Glen Ellan Rd.- River Valley-City Centre	Every 30 minutes between 05:00 and 06:00 Every 15 minutes between 06:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 20 minutes between 06:00 and 09:00 Every 15 minutes between 09:00 and 19:00 Every 20 minutes between 19:00 and 23:00 Every 30 minutes between 23:00 and 00:00	Every 30 minutes between 08:00 and 10:00 Every 20 minutes between 10:00 and 19:00 Every 30 minutes between 19:00 and 00:00

Table 5 | BusConnects Frequency Service

5. Proposed Development

5.1 Site Location

The proposed Large Scale Residential Development (LRD) will comprise 100 no. apartments/duplexes (17 no. studios, 45 no. 1-beds, 27 no. 2-beds and 11 no. 3 beds) within 4 no. blocks ranging in height from 3 to 6 storeys. All residential units will be provided with associated private balconies/terraces to the north/ south/ east/ west elevations. Provision of internal amenity space and lobby/reception area at ground floor of the apartment block. Vehicular/pedestrian/cyclist access from Grace Park Court and pedestrian/cyclist and emergency access via Ellenfield Road. All associated site development works including import, export and reuse of material to achieve appropriate site levels, infrastructure and enabling works including water services provision and upgrades, public utilities, open spaces (including play areas), surface car parking, set down areas, cycle parking areas/buildings, landscaping and boundary treatment works, plant areas (at ground and roof level), green roofs, roof mounted photovoltaic (PV) panels, ESB substation, and waste storage.

The Schedule of Accommodation is shown in the table below.

Description	Studio	1-bed	2-bed	3-bed	Total
Apartments/Duplexes	17	45	27	11	100

Table 6 | Schedule of Accommodation

The proposed development also includes associated site development works, services provision, open spaces, car parking, cycle parking, bin stores, vehicular/pedestrian accesses, landscaping, boundary treatment works, foul, surface water drainage, and all associated site development works, etc, all on an overall site area of c. 0.58 hectares.

5.2 Internal Layout and Vehicular Access Points

All internal roads within the subject development are designed for a speed limit of 30km/h.

The design and layout of the proposal have been prepared to fully comply with the current relevant design standards and specifications applicable to this form of development.

Vehicular and pedestrian access to the subject development will be provided off Beaumont Road, on the southern side of the development as shown in **Figure 13** below.

Additionally, a pedestrian and cyclist access will be provided on the northern side of the development to link to surrounding neighbourhoods.



Figure 13 | Proposed Development – Access Point

The received LRD opinion (Pl. Apl. Reg. Ref. No. LRD9004/26-S2) has raised issues regarding the internal road.

The comments received have been addressed, and the road layout has been updated accordingly. In particular, all parking spaces are a minimum of 5.10m to allow overhang of vehicles to be accommodated within the parking space.

In addition, a dedicated loading bay has been incorporated within the development to facilitate servicing and delivery activities. Its dimensions are compliant with DMURS standards.

Furthermore, the layout has been revised to ensure that the development is not car-dominated. The central area is now designed as a shared surface for pedestrians and cyclists, with no internal vehicular route connecting Beaumont Road to Ellenfield Road. Permeability at this location is restricted to pedestrians and cyclists only, with the exception of access for fire tender emergency vehicles.

Moreover, the residential car parking area to the south of the development has been enhanced through the introduction of landscaped breaks between parking bays, creating a more attractive and pedestrian-friendly environment.

Further details are provided in Waterman Moylan Consulting Engineers Document No. 20-048.021 (LRD Opinion Response), and in Drawings No. 20-048-P2030 (DMURS Layout) and No. 20-048-P2020 (Parking Layout), submitted as part of the planning application package.

5.3 Pedestrian and Cyclist Infrastructure

The proposed development has been designed with pedestrians and cyclists taking precedence over other modes of transport. In this regard, footpaths are provided throughout the development with suitable connections through the open spaces. Footpaths within the development will generally be 1.8m wide.

5.4 Mobility Management Plan

A Mobility Management Plan has been prepared by Waterman Moylan Consulting Engineers, which will be implemented and developed on an ongoing basis with the triple objectives of promoting sustainability, enhancing public transport, and reducing dependency on the use of the private car.

The Mobility Management Plan is designed to address the typical day-to-day operational requirements at the site. It will be implemented and managed by the Mobility Management Plan Coordinator, who will be responsible for overseeing the implementation and management of the Mobility Management Plan.

The Mobility Management Plan is detailed in the Waterman Moylan Consulting Engineers report *No. 20-048r.018 Mobility Management Plan*, which is included in the documentation package.

5.5 Parking Management Plan

A Parking Management Plan has been prepared by Waterman Moylan Consulting Engineers, which will encourage residents to adopt sustainable transport systems.

The report includes detailed management plan for both, the car parking and cycle parking use. The ongoing implementation of this Parking Management Plan will facilitate the sustainability of transport to and from the site and reduce the reliance on private vehicle use by promoting more sustainable and cost-effective travel habits such as cycling.

The Parking Management Plan is detailed in the Waterman Moylan Consulting Engineers report *No. 20-048r.019 Parking Management Plan*, which is included in the documentation package.

6. Existing Travel Patterns – Census 2022

6.1 Statical Small Areas

To understand the vehicle ownership and mode of travel choice of the residents in the area, public information from the Census 2022 was used. The Census was conducted by the Central Statistics Office on 3rd April 2022, and distributed information in small areas that divide the territory.

It is important to choose a wide number of areas to obtain representative values that will allow us to approximate the future behaviour of the inhabitants within the subject site. For this reason, 20 representative areas have been selected to reflect the subject development.

The Small Areas that were consulted are shown in **Figure 14**.

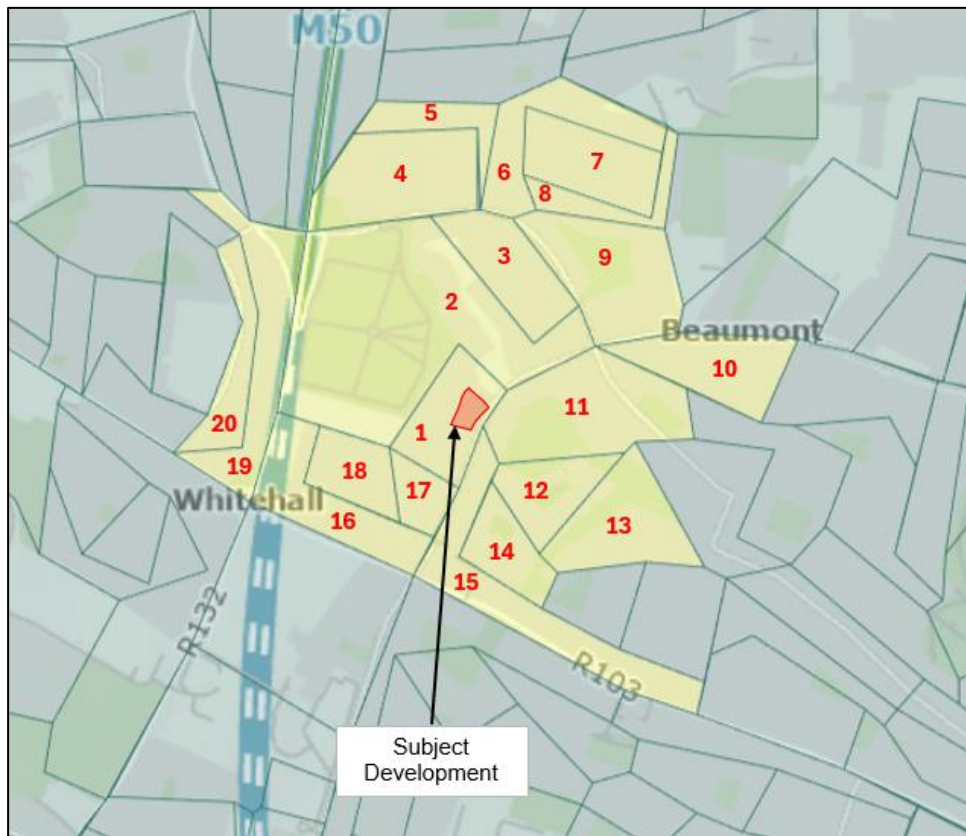


Figure 14 | Consulted Small Area (Source: Census 2022)

6.2 Modal Split and Car Ownership

The modal split based on statistical data provides insight into the behaviour of residents in the surrounding area of the Subject Development. It is therefore likely that residents of the Subject Development exhibit similar behaviour to that statistically surveyed.

The results showed of the 5,440 people generated 3,371 trips for commuting to work, school, or college.

The modal split for commuting in the selected Small Area was 47% by car, 20.3% by public transport (bus and train), 22.3% by foot, and 10.4% by bike.

The results of the survey on car ownership in the small areas surveyed are presented in **Appendix B**.

7. Trip Generation and Distribution

7.1 Trip Generation

Trip Generation has been assessed based on the car parking spaces available within the Subject Development.

To provide a robust assessment, it has been assumed that all vehicles will depart from the proposed development during the AM peak hour, with 30% of these vehicles returning to the site within the same period. For the PM peak hour, the reverse pattern has been assumed.

In summary the considered trip rates are detailed below.

Land Use	AM Peak Hour		PM Peak Hour	
	Arrivals	Departures	Arrivals	Departures
Car parking Space	0.30	1.00	1.00	0.30

Table 7 | Car Trip Rates – AM & PM Peak Hours

To illustrate the difference between the adopted trip rates and those obtained using conventional methodologies, the potential traffic generation of the proposed development has been estimated using the TRICS software modelling database. TRICS is the national standard for trip generation and analysis in Ireland. The database system is based on surveyed traffic counts at various developments in both the UK and Ireland, which provides a reasonable indication of the potential traffic to/from the assessed developments.

Given that the TRICS software provides a substantial dataset of survey information across a wide range of development types, a selection of surveyed sites with similar characteristics was considered to ensure that the derived trip rates are representative of the Subject Development.

The key assumptions and principal results are summarised below for both the morning and evening peak hours. Full TRICS output results are provided in **Appendix C**. This report has been prepared using the TRICS database, Version 8.26.3.

The filter criteria applied to the Subject Site are summarised below:

- Residential sites with a total number of units ranging between 100 and 200.
- Residential Areas, category Flats Privately Owned.
- Dwellings located within Edge of Town and Town Centre areas.

Table 8 below highlights the difference between the two sets of trip rates.

Trip Rates (per unit)	AM Peak Hour		PM Peak Hour	
	Arrivals	Departures	Arrivals	Departures
Proposed Trip Rates	0.30	1.00	1.00	0.30
TRICS Database	0.039	0.094	0.083	0.046
Comparison	769%	1064%	1205%	652%

Table 8 | TRICS – Vehicle Trip Rates – Proposed Development

As shown in the table above, the assumed trip rates indicate higher values compared with those that can be obtained from TRICS Database.

7.2 Subject Development

Potential peak hour traffic generation for the proposed development has been calculated, based on the proposed Trip Rates (refer to **Table 7** above), are shown in **Table 9** below.

Use	Units/sqm	PROPOSED DEVELOPMENT			
		AM		PM	
		IN	OUT	IN	OUT
Trips Generated	42	13	42	42	13

Table 9 | Trip Generation –Subject Development

It is estimated that the subject development will generate a total of 55 vehicle movements during the AM peak hour (13 arrivals and 42 departures) and 55 vehicle movements during the PM peak hour (42 arrivals and 13 departures).

With regard to trip distribution, and in order to provide a robust assessment, two potential scenarios have been considered:

- A) All inbound and outbound traffic uses Junction 1, see **Figure 15** below.
- B) All inbound and outbound traffic uses Junction 2, see **Figure 16** below.

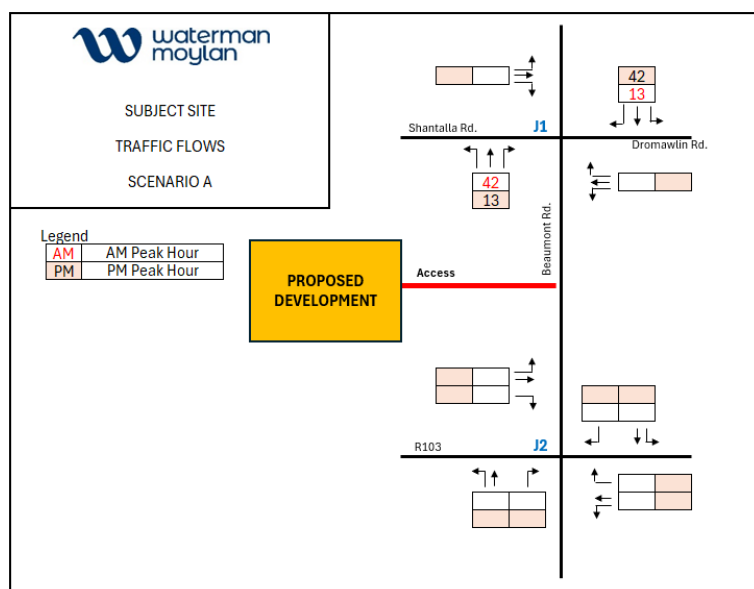


Figure 15 | Subject Site – Traffic Flows – Scenario A

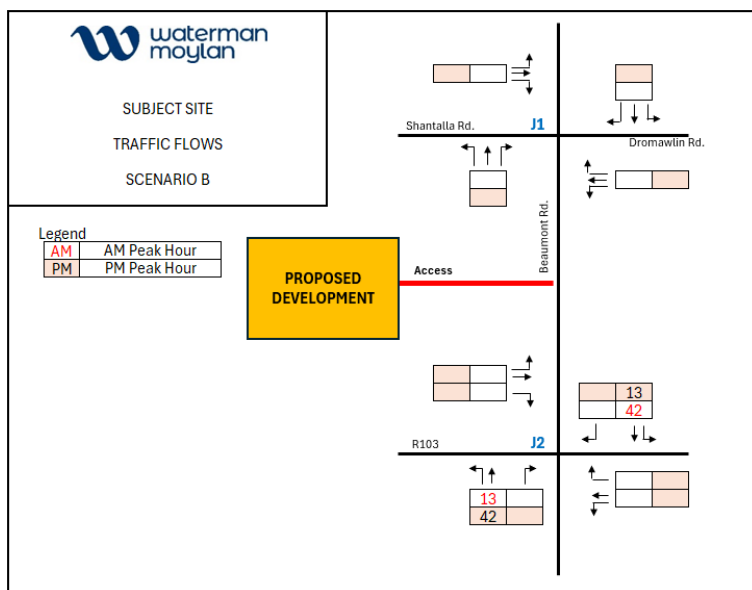


Figure 16 | Subject Site – Traffic Flows – Scenario B

7.3 Traffic Growth rates

It has been assumed within this TTA that the proposed development will be constructed with assumed year of opening as 2030. As per methodology adopted in the 'Transport Assessment Guidelines (May 2014)', which the subject TTA is based on, the surveyed junctions were also assessed for the future design years of 2035 (Opening year + 5 years) and 2045 (opening year +15 years).

The traffic growth rate used to factor up the 2025 base year traffic movements (refer to **Section 3.4** of this report) is in accordance with *Table 6.1: Link-Based Growth Rates: Metropolitan Area Annual Growth Rates* within the *TII Publications – Project Appraisal Guidelines for National Roads, Unit 5.3 – Travel Demand Projections (October 2021)* and with the *Appendix 4* of the *Implementation Roadmap for the National Planning Framework (July 2018)* which defines the Dublin Metropolitan Area.

Based on the Traffic Survey, the urban growth area has been identified as the central area, where Light Vehicles are the predominant vehicle type.

The factors considered in the current assessment are shown below:

- Base Year: 2026
- Opening Year: 2030 = 1.066 (growth factor from 2026 to 2030)
- Opening Year + 5: 2035 = 1.094 (growth factor from 2026 to 2035)
- Opening year + 15: 2045 = 1.147 (growth factor from 2026 to 2045)

8. Junction Assessment

8.1 Junctions Assessed

The main junctions in the local area are shown in **Figure 5** above and described as follow:

- **Junction 1:** is an existing signal-controlled junction located at the intersection of Shantalla Road, Beaumont Road and Dromawling Road
- **Junction 2:** is an existing signal-controlled junction located at the intersection of the R103, Beaumont Road and Grace Park Road.

8.2 Traffic impact of the Subject Development

The TII document *Traffic and Transport Assessment Guidelines (2014)* provides thresholds in relation to the impact of a proposed development on the local road network. These thresholds are introduced in **Section 1.5** of this TTA.

The TII document indicates that the impact of new development is considered to be significant if the level of traffic generated by them exceeds the thresholds of 10% for normal operating networks and 5% for congested networks. When such levels of impact are generated, a more detailed assessment should be carried out to determine the specific impact on the operational performance of the network.

A summary of the existing two-way traffic flows (refer to **Section 3.4** above) and the proposed traffic flows (refer to **Section 7.2** above) increase at each studied junction is presented below.

Junction	Junction Existing Flow - AM Peak Hour	Junction Existing Flow - PM Peak Hour	Additional Traffic Two-way Flow (AM)	Additional Traffic Two-way Flow (PM)	% Expected Increase (AM)	% Expected Increase (PM)
1	1134	1119	55	55	4.85%	4.92%
2	1707	1703	0	0	0	0

Table 10 | Existing and Expected Two-way Flows – Scenario A

As shown in the table above, both assessed junctions are expected to experience increases in traffic flow below the 5% threshold defined in the Traffic and Transport Assessment Guidelines (2014). Therefore, no further assessment is required.

Junction	Junction Existing Flow - AM Peak Hour	Junction Existing Flow - PM Peak Hour	Additional Traffic Two-way Flow (AM)	Additional Traffic Two-way Flow (PM)	% Expected Increase (AM)	% Expected Increase (PM)
1	1134	1119	0	0	0	0
2	1707	1703	55	55	3.22%	3.23%

Table 11 | Existing and Expected Two-way Flows – Scenario B

As shown in the table above, both assessed junctions are expected to experience increases in traffic flow below the 5% threshold defined in the Traffic and Transport Assessment Guidelines (2014). Therefore, no further assessment is required.

8.3 Junction Assessment Conclusion

As can be seen above, both assessed junctions are expected to experience increases in traffic flow below the 5% threshold defined in the Traffic and Transport Assessment Guidelines (2014). Therefore, no further assessment is required.

It is worth highlighting that the trip rates adopted in this assessment are higher than those typically derived from the TRICS database. As such, they provide a robust assessment of the existing junctions. The results indicate that, even under this more conservative scenario, the traffic impact remains minimal.

9. Parking Strategy

9.1 Car Parking

To determine the appropriate amount of car and cycle parking for the Subject Development, reference will be made to the following guidelines/policies:

- Dublin City Development Plan 2022-2028
- Sustainable Urban Housing: Design Standards for New Apartments (2025)
- Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)

Details of the specific Car Parking Management are set out in the Waterman Moylan Report No. 20-048r.019 *Parking Management Plan*, which is included in the documentation package.

9.1.1 Dublin City Development Plan 2022-2028

Dublin City Development Plan 2022-2028 established the standard for all new development within the city. According with this, the Dublin City is divided into three zones for the purpose of parking control, as illustrated on Map J of the development plan. An extract of this map is shown in **Figure 17** below.

The parking zones, as defined in the *Dublin City Development Plan 2022-2028*, are indicated below:

- *Parking Zone 1 is generally within the Canal Cordon and within North Circular Road in recognition of active travel infrastructure and opportunities and where major public transport corridors intersect.*
- *Parking Zone 2 occurs alongside key public transport corridors.*
- *The remainder of the city falls under Parking Zone 3.*

Dublin City Development Plan 2022-2028 “A relaxation of maximum car parking standards will be considered in Zone 1 and Zone 2 for any site located within a highly accessible location. Applicants must set out a clear case satisfactorily demonstrating a reduction of parking need for the development based on the following criteria:

- *Locational suitability and advantages of the site.*
- *Proximity to High Frequency Public Transport services (10 minutes’ walk).*
- *Walking and cycling accessibility/permeability and any improvement to same.*
- *The range of services and sources of employment available within walking distance of the development.*
- *Availability of shared mobility.*
- *Impact on the amenities of surrounding properties or areas including overspill parking.*
- *Impact on traffic safety including obstruction of other road users.*
- *Robustness of Mobility Management Plan to support the development.”*

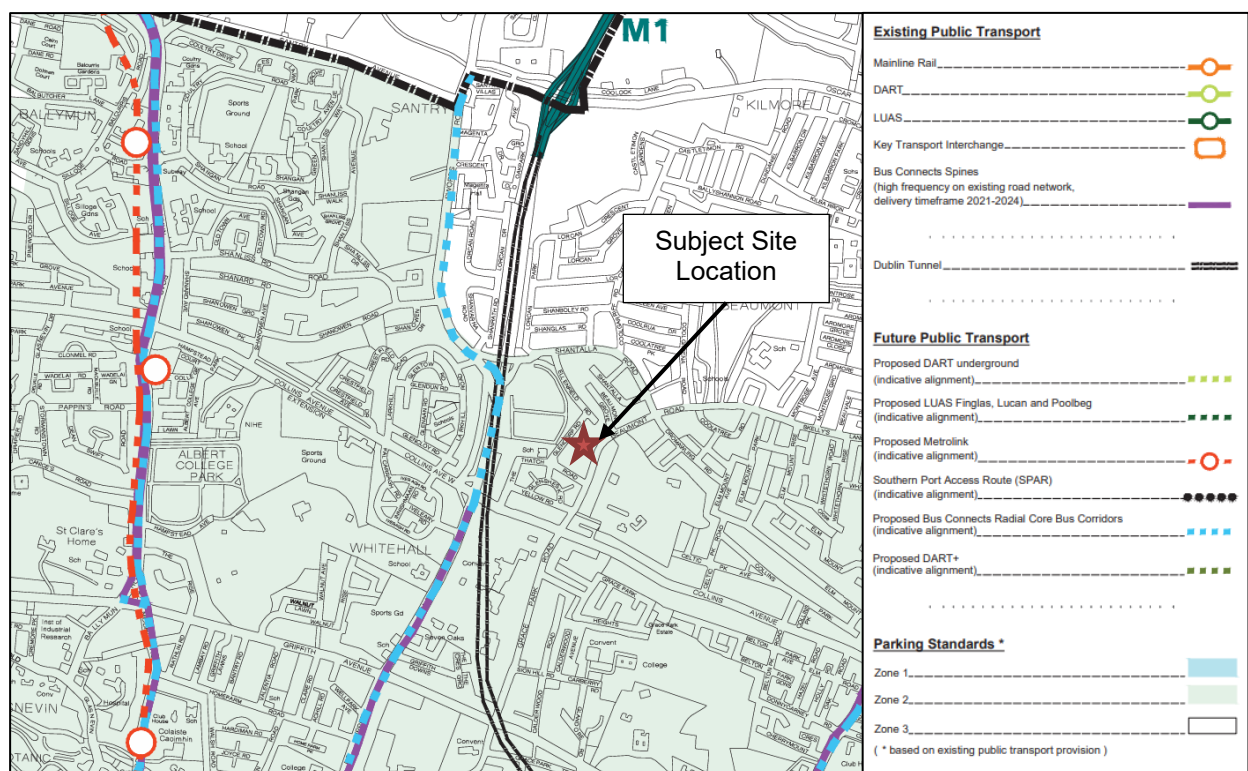


Figure 17 | Areas for the purpose of parking control
(Source: Map J - Dublin City Development Plan 2022-2028)

Table 12 below, extracted from the *Table 2: Maximum Car Parking Standards for Various Land Uses* within the *Appendix 5 of the Dublin City Development Plan 2022-2028*, sets out the required level of on-site parking to be provided for residents, staff and visitors for various types of development.

The standard states that “(...) *these car parking standards shall be generally regarded as the maximum parking provision and parking provision in excess of these maximum standards shall only be permitted in exceptional circumstances e.g. boundary areas, or where necessary for the sustainable development of a regeneration area.*”

Category	Land-Use	Zone 1	Zone 2	Zone 3
Accommodation	Houses, Apartments/ Duplexes	0.5 per dwelling	1 per dwelling	1 per dwelling

Table 12 | Dublin City Development Plan 2022-2028 – Car Parking Spaces Standard

Based on the information shown in **Figure 17** above, the Subject Development is located in Zone 2. Therefore, the maximum number of car parking spaces is 1 per each dwelling and 1 per 100 sqm GFA of childcare facility. The table below summarises the maximum number of car parking spaces according to the *Dublin City Development Plan 2022-2028*.

Dublin City Development Plan 2022-2028 Maximum Car Parking Spaces			
Unit type	No./GFA	Standard	Total
Apartments / Duplexes	100 units	1	100

Table 13 | Dublin City Development Plan 2022-2028 – Maximum Car Parking Spaces

In addition, the *Dublin City Development Plan 2022-2028* indicates that:

Electric Vehicles (EV): “(...) All new developments must be futureproofed to include EV charging points and infrastructure. In all new developments, a minimum of 50% of all car parking spaces shall be equipped with fully functional EV Charging Point(s). The remaining spaces shall be designed to facilitate the relevant infrastructure to accommodate future EV charging. Space for EV charging infrastructure shall be clearly detailed in planning applications. (...)”

Motorcycle Parking: “New developments shall include provision for motorcycle parking in designated, signposted areas at a rate of 5% of the number of car parking spaces provided. Motorcycle parking areas shall have limited gradients to enable easy manoeuvrability and parking. Fixed and robust features such as rails, hoops or posts should be provided to secure a motorcycle using a chain or similar device.”

Shared Mobility: “(...) The provision of car club parking spaces in all developments will be supported. Where a development, residential and/or commercial, seeks to include car sharing services as part of the car parking provision on site, details of the operational management of the car club must be provided. All car club spaces shall be fully equipped with EV infrastructure.”

Accessible Car Parking: “(...) Where car parking is provided, whether for residents, employees, visitors or others, a number of car-parking spaces for people with accessibility requirements shall be provided on a proportional basis. At least 5% of the total number of spaces shall be designated car parking spaces, with a minimum provision of at least one such space, which ever one is the greatest. All accessible parking shall be allocated and suitably signposted for convenient access.

9.1.2 Sustainable Urban Housing: Design Standards for New Apartments (2025)

The following extract from the *Sustainable Urban Housing: Design Standards for New Apartments (2025)*, summarises the car parking guidelines for new apartments:

Having regard to the types of location in cities and towns that may be suitable for apartment development, car parking ratios should be minimised, substantially reduced or wholly eliminated at locations that have good access to urban services and to public transport. Maximum car parking rates are set out in Section 5.25 (SPPR 3) of the SRDCSGs.

9.1.3 Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)

The *Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities* set national planning policy and guidance in relation to the planning and development of urban and rural settlements, with a focus on sustainable residential development and the creation of compact settlements.

Chapter 5.3.4 Car Parking – Quantum, Form and Location divided the car parking spaces in three areas:

- (i) In city centres and urban neighbourhoods of the five cities, defined in Chapter 3 of that document (Table 3.1 and Table 3.2) car-parking provision should be minimised, substantially reduced or wholly eliminated. The maximum rate of car parking provision for residential development at these locations, where such provision is justified to the satisfaction of the planning authority, shall be 1 No. space per dwelling.
- (ii) In accessible locations, defined in Chapter 3 of that document (Table 3.8) car- parking provision should be substantially reduced. The maximum rate of car parking provision for residential development, where such provision is justified to the satisfaction of the planning authority, shall be 1.5 No. spaces per dwelling.

(iii) In intermediate and peripheral locations, defined in Chapter 3 of that document (Table 3.8) the maximum rate of car parking provision for residential development, where such provision is justified to the satisfaction of the planning authority, shall be 2 No. spaces per dwelling.

Table 3.1 of *Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities* defines:

City – Centre: The city centres of Dublin and Cork, comprising the city core and immediately surrounding neighbourhoods, are the most central and accessible urban locations nationally with the greatest intensity of land uses, including higher order employment, recreation, cultural, education, commercial and retail uses. It is a policy and objective of these Guidelines that residential densities in the range 100 dph to 300 dph (net) shall generally be applied in the centres of Dublin and Cork.

City - Urban Neighbourhoods: The city urban neighbourhoods category includes: (i) the compact medium density residential neighbourhoods around the city centre that have evolved overtime to include a greater range of land uses, (ii) strategic and sustainable development locations, (iii) town centres designated in a statutory development plan, and (iv) lands around existing or planned high-capacity public transport nodes or interchanges (defined in Table 3.8) – all within the city and suburbs area. These are highly accessible urban locations with good access to employment, education and institutional uses and public transport. It is a policy and objective of these Guidelines that residential densities in the range 50 dph to 250 dph (net) shall generally be applied in urban neighbourhoods of Dublin and Cork.

City - Suburban/Urban Extension: Suburban areas are the lower density car-orientated residential suburbs constructed at the edge of cities in the latter half of the 20th and early 21st century, while urban extension refers to the greenfield lands at the edge of the existing built-up footprint that are zoned for residential or mixed-use (including residential) development. It is a policy and objective of these Guidelines that residential densities in the range 40 dph to 80 dph (net) shall generally be applied at suburban and urban extension locations in Dublin and Cork, and that densities of up to 150 dph (net) shall be open for consideration at 'accessible' suburban / urban extension locations (as defined in Table 3.8).

Table 3.8 of *Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities* indicates:

High-Capacity Public Transport Node or Interchange: Lands within 1,000 metres (1km) walking distance of an existing or planned high-capacity urban public transport node or interchange, namely an interchange or node that includes DART, high frequency Commuter Rail, light rail or MetroLink services; or locations within 500 metres walking distance of an existing or planned BusConnects 'Core Bus Corridor' stop.

Accessible Location: Lands within 500 metres (i.e. up to 5-6-minute walk) of existing or planned high frequency (i.e. 10-minute peak hour frequency) urban bus services.

Intermediate Location: Lands within 500-1,000 metres (i.e. 10-12-minute walk) of existing or planned high frequency (i.e. 10-minute peak hour frequency) urban bus services; and Lands within 500 metres (i.e. 6-minute walk) of a reasonably frequent (minimum 15-minute peak hour frequency) urban bus service.

Peripheral: Lands that do not meet the proximity or accessibility criteria detailed above. This includes all lands in Small and Medium Sized Towns and in Rural Towns and Villages.

Applicants should be required to provide a rationale and justification for the number of car parking spaces proposed and to satisfy the planning authority that the parking levels are necessary and appropriate, particularly when they are close to the maximum provision. The maximum car parking standards do not include bays assigned for use by a car club, designated short stay on-street Electric

Vehicle (EV) charging stations or accessible parking spaces. The maximum car parking standards do include provision for visitor parking.

The subject development falls within an accessible location, as defined above. Bus Route 1 operates at a frequency of 10 minutes during peak hours, with a bus stop located within 500 m of the site. In addition, Bus Routes 14 and 16 are within the 500 m catchment area, each operating at 15-minute intervals during peak hours. Bus Route N4 also serves the area, with a bus stop approximately 500 m from the site and a frequency of 12 minutes throughout the day.

In accordance with this standard, the maximum rate of car parking provision for residential development should be 1.5 No. parking space per unit type. The table below shows the maximum number of car parking according with the *Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)*.

Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024) Maximum Car Parking Spaces			
Unit type	No.	Standard	Total
Apartments	100 units	1.5	150
TOTAL			150

Table 14 | Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024) – Maximum Car Parking Spaces

9.1.4 Car Parking Proposed

Dublin City Development Plan 2022-2028 stipulates that a relaxation of maximum car parking standards will be considered in Zone 1 and Zone 2 for any site located within a highly accessible location. It is considered that the subject site is aligned with the criteria:

- **Location suitability and site advantages:** The site is located in a strategic location with several schools, health centres, retail areas and business parks within walking distance, as shown in walkability maps presented in **Section 3.5** above.
- **Proximity to High Frequency Public Transport services (10 minutes' walk):** The site is well served by public transport, and future improvements will enhance this further, providing an excellent public transportation as outlined above.

The nearest bus stops to the site are located on Beaumont Road (See **Figure 9** above). The closest stop is immediately adjacent to the subject development, with additional stops approximately 150 m (2-minute walk) from the site. These stops are served by bus routes 14 and 16. These services run at a frequency of 10 – 15 minutes.

There are also several bus routes which serve the site in the road network surrounding. Along Collins Avenue approximately 500m (7-minute walk), the subject development is served by bus route N4 which has a frequency of 10 minutes.

The subject site is located approximately 650m (8-minute walk), from the N1/Swords Road, which is a Quality Bus Corridor (QBC), that is served by additional bus routes such as 900, 901, 901M, 980B, 1, 904, 910, 41D, 847, 41, 41B, 41C, 101, 16D, 33, 33E and 33n.

Additionally, according to the Public Transport Accessibility Level (PTAL) analysis, the subject development is located in an area that has medium to high level of service as illustrated in **Figure 18** below.

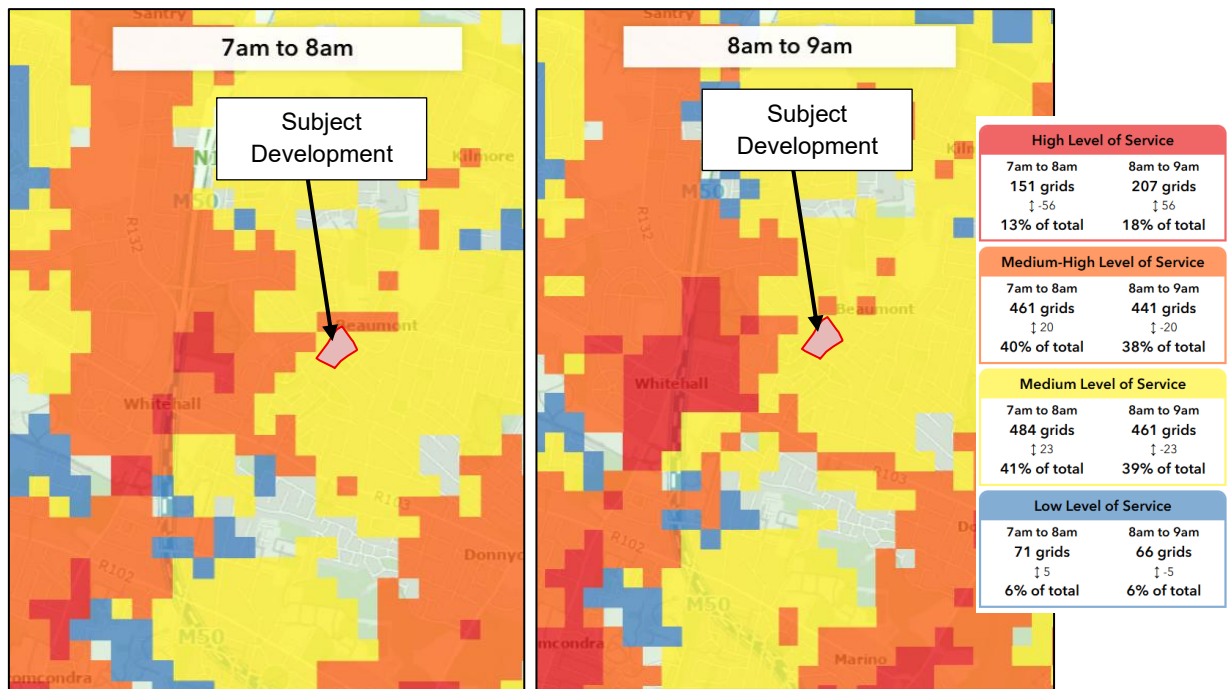


Figure 18 | Public Transport Accessibility Level

- **Walking and cycling accessibility/permeability and any improvement to same:** The internal layout is designed to provide pedestrian pathways to link internal units to the surrounding pedestrian network. The permeability of the site is ensured by providing access to/from the surrounding road network.
- **The range of services and sources of employment available within walking distance of the development:** The overall development is surrounded by several services and employment areas as indicated in **Section 3.5** above.

A 24-minute walk provides access to a range of amenities, including healthcare facilities such as Beaumont Hospital; educational facilities such as St. David's Boys National School and St. David's College, Artane; grocery stores including Centra, Tesco and Lidl; and retail destinations such as Omni Shopping Centre and Artane Castle Shopping Centre.

The subject development is well connected to surrounding areas via cycling infrastructure. A 24-minute walk provides access to a range of amenities, including healthcare facilities such as Beaumont Hospital; educational facilities such as St. David's Boys National School and St. David's College, Artane; grocery stores including Centra, Tesco and Lidl; retail destinations such as Omni Shopping Centre and Artane Castle Shopping Centre; public transport links including Killester, Connolly and Clontarf DART stations; and employment hubs such as Eastpoint Business Park, Jamestown Business Park and Port Tunnel Business Park.

- **Availability of shared mobility:** The site is located in close proximity to various alternative Go-Car facilities which are less than 10 minutes walking catchment from the subject site. The subject site will benefit from the Go-Car scheme with an allocated Go-Car parking space immediately adjacent to the subject development's access.
- **Impact on the amenities of surrounding properties or areas including overspill parking:** In terms of mobility, the primary objective of the developments is to discourage the use of private vehicles and encourage residents to choose more sustainable means of transport. The extensive public transport service in the area and the provision of carsharing within the development help to ensure that residents do not feel the need to own a car in order to reach their destination. In addition, to mitigate any potential negative effects, the following measures have been proposed:

- **Resident Parking Permits:** Introduction of a resident parking permit scheme to prioritize local residents.
- **Enhanced Public Transport:** Encouragement of public transport use through improved accessibility and frequency of services.
- **Cycle Facilities:** Provision of ample bicycle parking to promote cycling as an alternative mode of transport.

These measures aim to ensure that the development does not adversely affect the amenities of the surrounding properties and maintains the quality of life for local residents. Further information about this is provided in the Waterman Moylan Consulting Engineer report No. 20-048.018 *Mobility Management Plan*, which is attached to the current planning application under separated cover.

- **Impact on traffic safety including obstruction of other road users:** the overall development has been analysed to determine its potential impact on traffic safety, with a focus on preventing obstructions to other road users. Key strategies to enhance traffic safety and minimize obstructions include:
 - **Clear Signage:** Installation of clear and visible signage to guide drivers and pedestrians, reducing the risk of accidents.
 - **Provision of sufficient sightlines:** Sufficient sightlines have been provided at the entrance of subject development (see Waterman Moylan Drawing No. 20-048-P2016 – *Proposed Entrance Sightlines*).
- **Robustness of Mobility Management Plan to support the development:** The planning application documentation includes the Waterman Moylan Consulting Engineers report No. 20-048r.018 *Mobility Management Plan*, included under separate cover, which provides for several measures to be adopted to encourage the use of sustainable means of transport by residents of the subject development.

Considering the information indicated above, the proposed 42 No. car parking spaces assigned as follows:

Proposed Car Parking Summary			
Unit Type	No. of Units	Spaces Proposed	Number of Spaces
Apartments / Duplexes	100	41 spaces	41
Car Sharing Parking		1 space	1
TOTAL	100		42

Table 15 | Car Parking Proposed

Car parking spaces have increased from the proposed 0.3 according to the received LRD opinion. The level of car parking proposed is considered adequate, as the subject development is located within an area with a medium to high level of public transport and public amenities service.

In addition, the proposed site includes the following:

- **EV parking:** A total of 22 No. EV parking spaces are proposed. The remaining 19 No. Spaces are designed to facilitate the future installation of EV chargers.
- **Car Club:** Additional 1 No. car sharing parking spaces are proposed.
It is worth noting that, based on an assessment carried out by GoCar, customers of the service tend not to purchase a car, replace an existing vehicle, or acquire a second car. Each GoCar vehicle is estimated to replace approximately 10–20 privately owned cars on the road.
- **Accessible Car Parking:** A total of 2 No. accessible car parking spaces are proposed.
- **Motorcycle parking spaces:** A total of 2 No motorcycle parking spaces are proposed.

9.2 Cycle Parking

To determine the appropriate amount of cycle parking for the Subject Development, reference will be made to the following guidelines/policies:

- Dublin City Development Plan 2022-2028
- Sustainable Urban Housing: Design Standards for New Apartments (2025)
- Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)

Details of the specific Cycle Parking Management are set out in the *Waterman Moylan Report No. 20-048r.019 Parking Management Plan*, which is included in the documentation package.

9.2.1 Dublin City Development Plan 2022-2028

Dublin City Development Plan 2022-2023 indicates all new developments are required to fully integrate cycle facilities into the design and operation of the schemes.

Table 16 below, extracted from the *Table 1: Bicycle Parking Standards for Various Land Uses* within the *Appendix 5 of the Dublin City Development Plan 2022-2028*, sets out the required level of on-site parking to be provided for residents, staff and visitors for various types of development. The standard states that “*Bicycle parking is divided into two categories- Long term spaces are designed for use by residents and employees and shall be located in a secure and well-lit area. Short stay/visitor spaces are designed for use by the general public and shall be located in highly visible areas for ease of access.*”

Category	Land-Use	Long Term	Short Term / Visitor
Accommodation	Residential Apartment	1 per bedroom	1 per 2 apartments
Education	Crèche	1 per 15 staff	1 per 10 children
Civic, Community, Religious	Community space	1 per 5 staff	1 per 100 sqm GFA

Table 16 | Dublin City Development Plan 2022-2028 – Bicycle Parking Standards

The number of cycle parking for residents (long term) in residential apartments includes the provision for e-bikes/cargo bikes/bike trailers/adapted bikes.

Using the information in the table above, the number of bicycle spaces required (norm) per Dublin City Development Plan 2022-2028 is determined and shown in the table below.

Dublin City Development Plan 2022-2028 Required Cycle Parking Spaces				
Unit Type	No.	Long-term Ratio	Short-term Ratio	Long- + Short- Term Cycle Parking
Studio	17	1 per unit	0.5 per unit	17 + 8
1-Bed Apartments	45	1 per unit	0.5 per unit	45 + 22
2-Bed Apartments	27	2 per unit	0.5 per unit	54 + 14
3-Bed Apartments	11	3 per unit	0.5 per unit	33 + 6
TOTAL	100	1.49	0.5	149 + 50

Table 17 | Dublin City Development Plan 2022-2028 – Required Cycle Parking Spaces

9.2.2 Sustainable Urban Housing: Design Standards for New Apartments (2025)

The following extract from the *Sustainable Urban Housing: Design Standards for New Apartments (2025)*, summarises the bicycle parking guidelines for new apartments:

Requirements for the quantity and design of bicycle parking are set out in Section 5.25 (including SPPR 4) of the SRDCSGs.

9.2.3 Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)

The *Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities* set national planning policy and guidance in relation to the planning and development of urban and rural settlements, with a focus on sustainable residential development and the creation of compact settlements.

The chapter 5.3.5 Bicycle Parking and Storage indicate that in areas of high and medium accessibility, planning authorities must ensure that new residential developments have high quality cycle parking and cycle storage facilities for both residents and visitors. Access to secure storage of bicycles is a key concern for residents in more compact housing developments.

It is a specific planning policy requirement of these Guidelines that all new housing schemes (including mixed-use schemes that include housing) include safe and secure cycle storage facilities to meet the needs of residents and visitors. The following requirements for cycle parking and storage are recommended:

- (i) **Quantity** – in the case of residential units that do not have ground level open space or have smaller terraces, a general minimum standard of 1 cycle storage space per bedroom should be applied. Visitor cycle parking should also be provided. Any deviation from these standards shall be at the discretion of the planning authority and shall be justified with respect to factors such as location, quality of facilities proposed, flexibility for future enhancement/ enlargement, etc. It will be important to make provision for a mix of bicycle parking types including larger/heavier cargo and electric bikes and for individual lockers.
- (ii) **Design** – cycle storage facilities should be provided in a dedicated facility of permanent construction, within the building footprint or, where not feasible, within an adjacent or adjoining purpose-built structure of permanent construction. Cycle parking areas shall be designed so that cyclists feel safe. It is best practice that either secure cycle cage/compound or preferably locker facilities are provided.

Table 18 below shows the Bicycle Parking Spaces *required by Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)*.

<i>Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)</i> Required Bicycle Parking Spaces (norm)				
Unit Type	No.	Long-term Ratio	Short-term Ratio	Long- + Short- Term Cycle Parking
Studio	17	1 per unit	0.5 per unit	17 + 8
1-Bed Apartments	45	1 per unit	0.5 per unit	45 + 22
2-Bed Apartments	27	2 per unit	0.5 per unit	54 + 14
3-Bed Apartments	11	3 per unit	0.5 per unit	33 + 6
Total	100	1.49	0.5	149 + 50

Table 18 | Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)– Required Bicycle Parking Spaces

9.2.4 Bicycle Parking Proposed

To determine the appropriate amount of cycle parking for the proposed development, reference will be made to the following guidelines/policies:

- Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)
- Dublin City Development Plan (2022 – 2028)

Cycle parking has been proposed in accordance with *Dublin City Development Plan 2022-2028* as illustrated in **Table 19** below. Cycle parking has been proposed to encourage residents to use more sustainable transport modes. For this reason, a total of 150 no. cycle parking spaces is proposed for residents and 50 no. for visitors.

A detailed breakdown of the bicycle parking is shown in **Table 19** below.

Unit Type	No.	Long-term Ratio	Short-term Ratio	Long-term Cycle Parking	Short- Term Cycle Parking
Studio	17	1 per unit	0.5 per unit	17	8
1-Bed Apartments	45	1 per unit	0.5 per unit	45	22
2-Bed Apartments	27	2 per unit	0.5 per unit	54	14
3-Bed Apartments	11	3 per unit	0.5 per unit	33	6
Additional Cycle parking Spaces				1	-
Total	100	1.50	0.5	150	50

Table 19 | Proposed Cycle Parking

10. Summary and Conclusion

This Traffic and Transport Assessment (TTA) has been prepared by Waterman Moylan as part of the planning documentation for a large-scale residential development on a site comprises of 100 No. units located at Beaumont Road / Beaumont Grove / Grace Park Court / Ellenfield Road, Beaumont, Dublin 9.

The proposed Large Scale Residential Development (LRD) will comprise 100 no. apartments/duplexes (17 no. studios, 45 no. 1-beds, 27 no. 2-beds and 11 no. 3 beds) within 4 no. blocks ranging in height from 3 to 6 storeys. All residential units will be provided with associated private balconies/terraces to the north/ south/ east/ west elevations. Provision of internal amenity space and lobby/reception area at ground floor of the apartment block. Vehicular/pedestrian/cyclist access from Grace Park Court and pedestrian/cyclist and emergency access via Ellenfield Road. All associated site development works including import, export and reuse of material to achieve appropriate site levels, infrastructure and enabling works including water services provision and upgrades, public utilities, open spaces (including play areas), surface car parking, set down areas, cycle parking areas/buildings, landscaping and boundary treatment works, plant areas (at ground and roof level), green roofs, roof mounted photovoltaic (PV) panels, ESB substation, and waste storage.

Dublin City Development Plan 2022-2028 sets out the land use categories. Map B of the mentioned development plan indicates that the subject site is situated within Zone Z1.

The subject site is bounded by the Beaumont Grove Road to the northeast, by the Grace Park Court and Beaumont Road to the southeast and by Grace Park Court to the southwest and existing neighbouring houses to the north and west.

For the purposes of the traffic assessment, it is assumed that the proposed site will be constructed and fully occupied by 2030. Furthermore, it is assumed that the entire Flemington LAP will be completed within the Opening Year and Opening Year + 5 assessment scenarios.

The assessment years may lag pending approval of the planning application and may differ from the programme.

10.1 Conclusion

Based on a thorough investigation, the TTA indicates the following:

Road Network Assessment

The main junctions in the local area are as follow:

- **Junction 1:** is an existing signal-controlled junction located at the intersection of Shantalla Road, Beaumont Road and Dromawling Road
- **Junction 2:** is an existing signal-controlled junction located at the intersection of the R103, Beaumont Road and Grace Park Road.

The trip distributions have been carried out considering two possible scenarios:

- A) All inbound and outbound traffic uses Junction 1.
- B) All inbound and outbound traffic uses Junction 2.

To quantify the volumes of traffic movements at the key junctions, traffic flow data for the main junction were requested from the Intelligent Transportation Systems, Transportation and Public Realm Department of Dublin City Council.

The proposed site includes a total of 42 car parking spaces (41 spaces for the proposed development and 1 car share company parking space). To provide a robust assessment, it has been assumed that all available vehicles will depart from the proposed development during the AM peak hour, with 30% of these

vehicles returning to the site within the same period. For the PM peak hour, the reverse pattern has been assumed.

It is estimated that the subject development will generate a total of 55 vehicle movements during the AM peak hour (13 arrivals and 42 departures) and 55 vehicle movements during the PM peak hour (42 arrivals and 13 departures).

The TII document *Traffic and Transport Assessment Guidelines (2014)* provides thresholds in relation to the impact of a proposed development on the local road network. The TII document indicates that the impact of new development is considered to be significant if the level of traffic generated by them exceeds the thresholds of 10% for normal operating networks and 5% for congested networks. When such levels of impact are generated, a more detailed assessment should be carried out to determine the specific impact on the operational performance of the network.

As results, both assessed junctions are expected to experience increases in traffic flow below the 5% threshold defined in the Traffic and Transport Assessment Guidelines (2014). Therefore, no further assessment is required.

It is worth highlighting that the trip rates adopted in this assessment are higher than those typically derived from the TRICS database. As such, they provide a robust assessment of the existing junctions. The results indicate that, even under this more conservative scenario, the traffic impact remains minimal.

Parking Assessment

To determine the appropriate amount of car and cycle parking for the proposed development, reference will be made to the following guidelines/policies:

- Sustainable Residential Development and Compact Settlements Guidelines for Planning Authorities (2024)
- Sustainable Urban Housing: Design Standards for New Apartments (July 2023)
- Fingal Development Plan 2023 – 2029 Standards

A total of 42 No. car parking spaces are proposed to serve the subject site. Of the total 42 No. spaces, 22 No. are proposed to be equipped with EV charging points, with the remainder designed to facilitate the future installation of EV chargers.

In addition, it is proposed to include 1 No. car-sharing parking space, 2 No. accessible car parking spaces, and 2 No. motorcycle parking spaces.

Regarding the cycle parking spaces, a total of 200 No. cycle parking spaces are proposed for subject development comprising of 150 long stay and 50 short stay cycle parking spaces.

Appendices

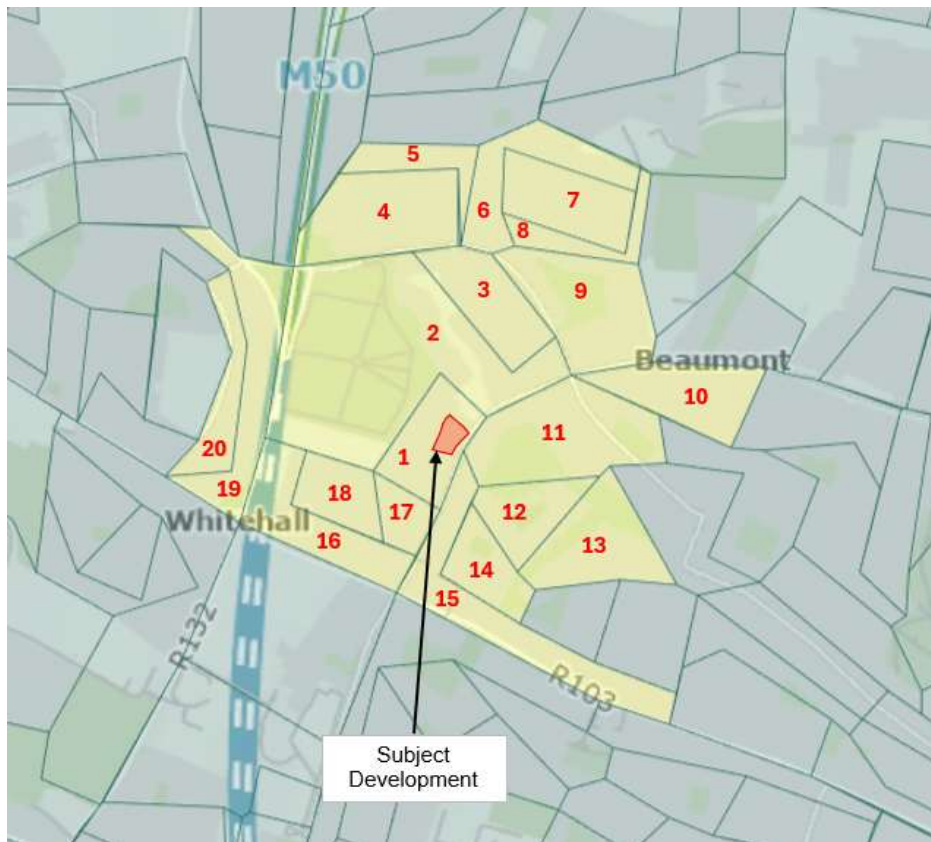
A. Census 2022

Car Ownership									
Zone	House	Persons	0	1	2	3	4	Total	Total car/house
1	93	225	33	41	14	1	0	72	0.774
2	97	254	27	43	18	5	2	102	1.052
3	110	298	24	55	25	1	1	112	1.018
4	93	254	12	42	35	0	1	116	1.247
5	74	206	10	31	30	1	1	98	1.324
6	75	195	15	33	24	1	2	92	1.227
7	106	270	28	46	24	5	1	113	1.066
8	81	222	18	33	22	1	2	88	1.086
9	94	261	19	43	20	3	3	104	1.106
10	106	307	15	44	33	5	3	137	1.292
11	167	539	28	65	38	6	3	171	1.024
12	92	282	27	35	11	3	0	66	0.717
13	127	411	9	50	42	9	7	189	1.488
14	94	299	12	39	30	6	4	133	1.415
15	132	303	42	43	32	4	4	135	1.023
16	108	235	36	52	9	5	1	89	0.824
17	86	202	23	44	15	2	0	80	0.930
18	96	219	28	47	18	2	0	89	0.927
19	66	207	6	33	20	4	1	89	1.348
20	95	251	27	42	15	5	0	87	0.916
Total	1992	5440	439	861	475	69	36	2162	1.09

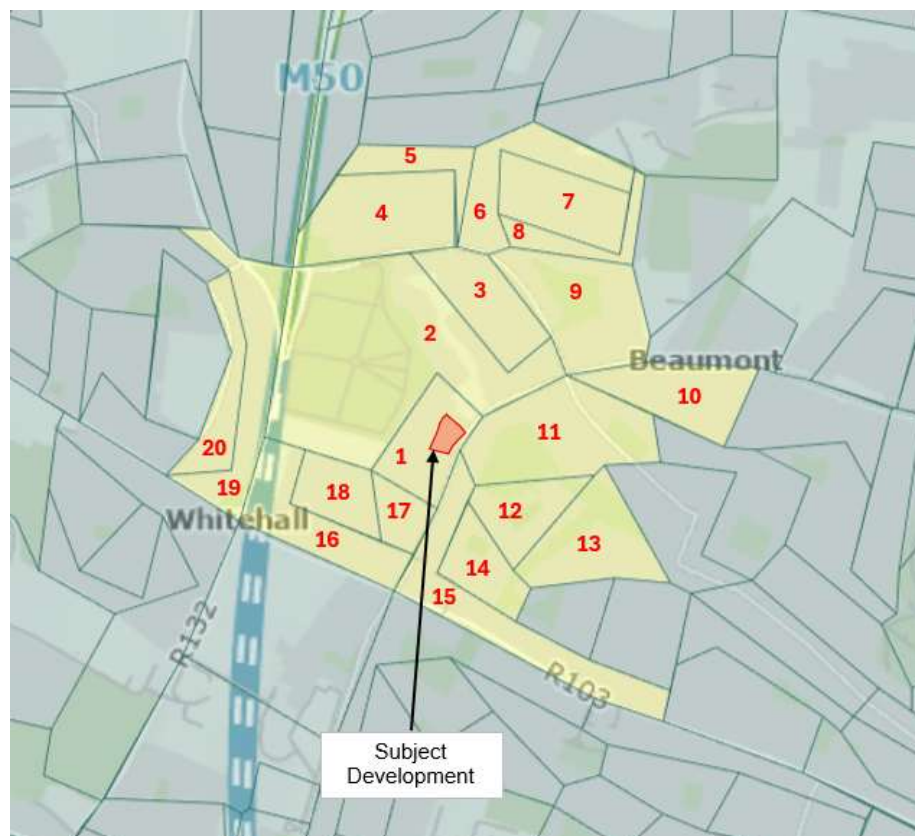


Modal Split									
Zone	House	Persons	On foot	Bike	Bus, minibus or coach	Train, DART or LUAS	Motors (*)	Other or not stated	Total travels
1	93	225	42	16	24	0	60	18	142
2	97	254	42	14	24	1	50	31	131
3	110	298	44	16	23	5	95	29	183
4	93	254	35	18	28	1	78	34	160
5	74	206	22	10	17	1	60	51	110
6	75	195	20	22	26	0	68	13	136
7	106	270	38	17	32	3	56	21	146
8	81	222	34	19	12	0	71	19	136
9	94	261	36	11	31	2	71	23	151
10	106	307	52	18	27	3	111	32	211
11	167	539	89	45	63	6	140	64	343
12	92	282	37	19	39	5	99	30	199
13	127	411	44	25	57	5	150	34	281
14	94	299	43	17	57	3	89	41	209
15	132	303	25	27	35	3	82	29	172
16	108	235	32	12	30	3	56	22	133
17	86	202	16	9	28	0	72	9	125
18	96	219	33	5	28	3	62	11	131
19	66	207	35	11	28	1	54	17	129
20	95	251	34	18	31	0	60	22	143
Total	1992	5440	753	349	640	45	1584	550	3371
			22.3%	10.4%	19.0%	1.3%	47.0%		100%

(*) Includes Motorcycle or Scooter, Car Drivers, Car Passengers, and Vans



Time Distribution of Trips										
zone	before 06:30	6:30 - 7:00	7:01 - 7:30	7:31 - 8:00	8:01 - 8:30	08:31 - 9:00	09:01 - 9:30	After 9:30	Not Stated	
1	9	13	12	25	50	6	5	14	6	140
2	13	13	26	25	39	6	0	5	10	137
3	11	18	20	52	35	16	3	8	9	172
4	15	24	20	37	35	6	1	5	16	159
5	8	11	10	17	36	10	2	8	8	110
6	17	15	14	31	26	13	4	8	8	136
7	10	17	15	39	36	15	1	7	6	146
8	10	22	15	25	37	13	2	7	8	139
9	12	23	17	23	40	9	3	16	14	157
10	11	24	17	55	50	16	8	15	8	204
11	13	37	24	107	99	18	4	20	52	374
12	11	22	17	51	53	13	5	14	20	206
13	22	42	35	69	58	23	6	14	14	283
14	11	24	17	64	57	9	3	11	13	209
15	8	15	22	53	31	12	3	19	14	177
16	13	18	14	28	30	9	1	9	16	138
17	8	23	14	25	31	6	4	8	4	123
18	12	20	15	23	34	13	1	8	4	130
19	4	14	15	27	38	13	2	7	4	124
20	3	25	18	25	31	18	1	11	18	150
	221	420	357	801	846	244	59	214	252	3414
	6%	12%	10%	23%	25%	7%	2%	6%		100%



B. Traffic Survey

Site: 15 Tuesday, 21 April 2026

Traffic Flow filename:NCITY_20260421.VS

Tuesday, 21 April 2026

Approach detector(s)...

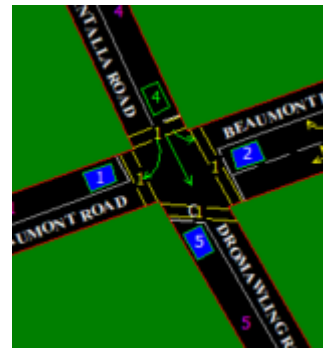
Approach 1 1

Approach 2 2

Approach 3 3

Approach 4 4

Approach 5 5



00:15 Approach 1	9	9	12:00 Approach 1	62	62
00:15 Approach 2	7	7	12:00 Approach 2	96	96
00:15 Approach 3	0	0	12:00 Approach 3	0	0
00:15 Approach 4	5	5	12:00 Approach 4	66	66
00:15 Approach 5	1	1	12:00 Approach 5	9	9
00:30 Approach 1	12	12	12:15 Approach 1	69	69
00:30 Approach 2	10	10	12:15 Approach 2	95	95
00:30 Approach 3	0	0	12:15 Approach 3	0	0
00:30 Approach 4	2	2	12:15 Approach 4	60	60
00:30 Approach 5	0	0	12:15 Approach 5	14	14
00:45 Approach 1	8	8	12:30 Approach 1	75	75
00:45 Approach 2	10	10	12:30 Approach 2	78	78
00:45 Approach 3	0	0	12:30 Approach 3	0	0
00:45 Approach 4	7	7	12:30 Approach 4	61	61
00:45 Approach 5	0	0	12:30 Approach 5	14	14
01:00 Approach 1	8	8	12:45 Approach 1	78	78
01:00 Approach 2	7	7	12:45 Approach 2	81	81
01:00 Approach 3	0	0	12:45 Approach 3	0	0
01:00 Approach 4	1	1	12:45 Approach 4	87	87
01:00 Approach 5	1	1	12:45 Approach 5	17	17
01:15 Approach 1	8	8	13:00 Approach 1	78	78
01:15 Approach 2	5	5	13:00 Approach 2	87	87
01:15 Approach 3	0	0	13:00 Approach 3	0	0
01:15 Approach 4	2	2	13:00 Approach 4	41	41
01:15 Approach 5	0	0	13:00 Approach 5	14	14
01:30 Approach 1	4	4	13:15 Approach 1	71	71
01:30 Approach 2	4	4	13:15 Approach 2	90	90
01:30 Approach 3	0	0	13:15 Approach 3	0	0
01:30 Approach 4	3	3	13:15 Approach 4	71	71
01:30 Approach 5	0	0	13:15 Approach 5	11	11
01:45 Approach 1	5	5	13:30 Approach 1	71	71
01:45 Approach 2	2	2	13:30 Approach 2	89	89
01:45 Approach 3	0	0	13:30 Approach 3	0	0
01:45 Approach 4	1	1	13:30 Approach 4	52	52
01:45 Approach 5	0	0	13:30 Approach 5	25	25
02:00 Approach 1	2	2	13:45 Approach 1	63	63

02:00 Approach 2	2	2	13:45 Approach 2	83	83
02:00 Approach 3	0	0	13:45 Approach 3	0	0
02:00 Approach 4	3	3	13:45 Approach 4	64	64
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02:15 Approach 3	0	0	14:00 Approach 3	0	0
02:15 Approach 4	1	1	14:00 Approach 4	59	59
02:15 Approach 5	0	0	14:00 Approach 5	20	20
02:30 Approach 1	4	4	14:15 Approach 1	75	75
02:30 Approach 2	3	3	14:15 Approach 2	85	85
02:30 Approach 3	0	0	14:15 Approach 3	0	0
02:30 Approach 4	0	0	14:15 Approach 4	66	66
02:30 Approach 5	0	0	14:15 Approach 5	18	18
02:45 Approach 1	3	3	14:30 Approach 1	64	64
02:45 Approach 2	3	3	14:30 Approach 2	54	54
02:45 Approach 3	0	0	14:30 Approach 3	0	0
02:45 Approach 4	1	1	14:30 Approach 4	83	83
02:45 Approach 5	0	0	14:30 Approach 5	24	24
03:00 Approach 1	0	0	14:45 Approach 1	84	84
03:00 Approach 2	2	2	14:45 Approach 2	87	87
03:00 Approach 3	0	0	14:45 Approach 3	0	0
03:00 Approach 4	1	1	14:45 Approach 4	55	55
03:00 Approach 5	3	3	14:45 Approach 5	23	23
03:15 Approach 1	3	3	15:00 Approach 1	56	56
03:15 Approach 2	5	5	15:00 Approach 2	109	109
03:15 Approach 3	0	0	15:00 Approach 3	0	0
03:15 Approach 4	1	1	15:00 Approach 4	60	60
03:15 Approach 5	0	0	15:00 Approach 5	25	25
03:30 Approach 1	1	1	15:15 Approach 1	71	71
03:30 Approach 2	5	5	15:15 Approach 2	100	100
03:30 Approach 3	0	0	15:15 Approach 3	0	0
03:30 Approach 4	0	0	15:15 Approach 4	70	70
03:30 Approach 5	0	0	15:15 Approach 5	36	36
03:45 Approach 1	1	1	15:30 Approach 1	65	65
03:45 Approach 2	4	4	15:30 Approach 2	90	90
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04:15 Approach 3	0	0	16:00 Approach 3	0	0

04:15 Approach 4	2	2	16:00 Approach 4	78	78
04:15 Approach 5	0	0	16:00 Approach 5	46	46
04:30 Approach 1	3	3	16:15 Approach 1	74	74
04:30 Approach 2	3	3	16:15 Approach 2	97	97
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04:45 Approach 5	0	0	16:30 Approach 5	39	39
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05:00 Approach 4	2	2	16:45 Approach 4	72	72
05:00 Approach 5	0	0	16:45 Approach 5	71	71
05:15 Approach 1	3	3	17:00 Approach 1	57	57
05:15 Approach 2	5	5	17:00 Approach 2	77	77
05:15 Approach 3	0	0	17:00 Approach 3	0	0
05:15 Approach 4	8	8	17:00 Approach 4	79	79
05:15 Approach 5	4	4	17:00 Approach 5	58	58
05:30 Approach 1	5	5	17:15 Approach 1	78	78
05:30 Approach 2	9	9	17:15 Approach 2	100	100
05:30 Approach 3	0	0	17:15 Approach 3	0	0
05:30 Approach 4	8	8	17:15 Approach 4	77	77
05:30 Approach 5	1	1	17:15 Approach 5	36	36
05:45 Approach 1	6	6	17:30 Approach 1	57	57
05:45 Approach 2	12	12	17:30 Approach 2	84	84
05:45 Approach 3	0	0	17:30 Approach 3	0	0
05:45 Approach 4	5	5	17:30 Approach 4	87	87
05:45 Approach 5	5	5	17:30 Approach 5	40	40
06:00 Approach 1	12	12	17:45 Approach 1	64	64
06:00 Approach 2	22	22	17:45 Approach 2	77	77
06:00 Approach 3	0	0	17:45 Approach 3	0	0
06:00 Approach 4	9	9	17:45 Approach 4	87	87
06:00 Approach 5	0	0	17:45 Approach 5	46	46
06:15 Approach 1	7	7	18:00 Approach 1	64	64
06:15 Approach 2	27	27	18:00 Approach 2	77	77
06:15 Approach 3	0	0	18:00 Approach 3	0	0
06:15 Approach 4	12	12	18:00 Approach 4	88	88
06:15 Approach 5	3	3	18:00 Approach 5	56	56
06:30 Approach 1	24	24	18:15 Approach 1	71	71
06:30 Approach 2	41	41	18:15 Approach 2	96	96
06:30 Approach 3	0	0	18:15 Approach 3	0	0
06:30 Approach 4	28	28	18:15 Approach 4	80	80
06:30 Approach 5	7	7	18:15 Approach 5	30	30

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07:15 Approach 5	9	9	19:00 Approach 5	38	38
07:30 Approach 1	62	62	19:15 Approach 1	58	58
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08:00 Approach 2	78	78	19:45 Approach 2	77	77
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08:15 Approach 2	81	81	20:00 Approach 2	88	88
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08:45 Approach 2	88	88	20:30 Approach 2	83	83
08:45 Approach 3	0	0	20:30 Approach 3	0	0
08:45 Approach 4	62	62	20:30 Approach 4	50	50
08:45 Approach 5	43	43	20:30 Approach 5	10	10
09:00 Approach 1	57	57	20:45 Approach 1	71	71
09:00 Approach 2	75	75	20:45 Approach 2	73	73

09:00 Approach 3	0	0	20:45 Approach 3	0	0
09:00 Approach 4	91	91	20:45 Approach 4	54	54
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09:15 Approach 1	72	72	21:00 Approach 1	39	39
09:15 Approach 2	79	79	21:00 Approach 2	80	80
09:15 Approach 3	0	0	21:00 Approach 3	0	0
09:15 Approach 4	85	85	21:00 Approach 4	41	41
09:15 Approach 5	44	44	21:00 Approach 5	10	10
09:30 Approach 1	68	68	21:15 Approach 1	39	39
09:30 Approach 2	82	82	21:15 Approach 2	52	52
09:30 Approach 3	0	0	21:15 Approach 3	0	0
09:30 Approach 4	72	72	21:15 Approach 4	30	30
09:30 Approach 5	23	23	21:15 Approach 5	9	9
09:45 Approach 1	63	63	21:30 Approach 1	31	31
09:45 Approach 2	90	90	21:30 Approach 2	48	48
09:45 Approach 3	0	0	21:30 Approach 3	0	0
09:45 Approach 4	84	84	21:30 Approach 4	33	33
09:45 Approach 5	16	16	21:30 Approach 5	9	9
10:00 Approach 1	63	63	21:45 Approach 1	44	44
10:00 Approach 2	91	91	21:45 Approach 2	39	39
10:00 Approach 3	0	0	21:45 Approach 3	0	0
10:00 Approach 4	45	45	21:45 Approach 4	38	38
10:00 Approach 5	23	23	21:45 Approach 5	9	9
10:15 Approach 1	74	74	22:00 Approach 1	37	37
10:15 Approach 2	72	72	22:00 Approach 2	40	40
10:15 Approach 3	0	0	22:00 Approach 3	0	0
10:15 Approach 4	61	61	22:00 Approach 4	18	18
10:15 Approach 5	13	13	22:00 Approach 5	7	7
10:30 Approach 1	59	59	22:15 Approach 1	41	41
10:30 Approach 2	88	88	22:15 Approach 2	33	33
10:30 Approach 3	0	0	22:15 Approach 3	0	0
10:30 Approach 4	63	63	22:15 Approach 4	24	24
10:30 Approach 5	16	16	22:15 Approach 5	3	3
10:45 Approach 1	71	71	22:30 Approach 1	27	27
10:45 Approach 2	99	99	22:30 Approach 2	17	17
10:45 Approach 3	0	0	22:30 Approach 3	0	0
10:45 Approach 4	57	57	22:30 Approach 4	22	22
10:45 Approach 5	14	14	22:30 Approach 5	6	6
11:00 Approach 1	70	70	22:45 Approach 1	18	18
11:00 Approach 2	108	108	22:45 Approach 2	32	32
11:00 Approach 3	0	0	22:45 Approach 3	0	0
11:00 Approach 4	60	60	22:45 Approach 4	11	11
11:00 Approach 5	19	19	22:45 Approach 5	8	8
11:15 Approach 1	86	86	23:00 Approach 1	20	20
11:15 Approach 2	80	80	23:00 Approach 2	19	19
11:15 Approach 3	0	0	23:00 Approach 3	0	0
11:15 Approach 4	56	56	23:00 Approach 4	9	9

11:15 Approach 5	17	17	23:00 Approach 5	1	1
11:30 Approach 1	51	51	23:15 Approach 1	19	19
11:30 Approach 2	92	92	23:15 Approach 2	22	22
11:30 Approach 3	0	0	23:15 Approach 3	0	0
11:30 Approach 4	48	48	23:15 Approach 4	9	9
11:30 Approach 5	15	15	23:15 Approach 5	3	3
11:45 Approach 1	68	68	23:30 Approach 1	17	17
11:45 Approach 2	97	97	23:30 Approach 2	11	11
11:45 Approach 3	0	0	23:30 Approach 3	0	0
11:45 Approach 4	54	54	23:30 Approach 4	7	7
11:45 Approach 5	14	14	23:30 Approach 5	3	3
			23:45 Approach 1	11	11
			23:45 Approach 2	12	12
			23:45 Approach 3	0	0
			23:45 Approach 4	7	7
			23:45 Approach 5	4	4
			24:00 Approach 1	9	9
			24:00 Approach 2	17	17
			24:00 Approach 3	0	0
			24:00 Approach 4	13	13
			24:00 Approach 5	0	0

Approach 1 AM peak 293 10:10 - 11:10 PM peak 319 13:45 - 14:45 Daily Total 4246
 Approach 2 AM peak 379 10:30 - 11:30 PM peak 387 14:45 - 15:45 Daily Total 5413
 Approach 3 AM peak 0 PM peak 0 Daily Total 0
 Approach 4 AM peak 394 07:30 - 08:30 PM peak 342 17:15 - 18:15 Daily Total 4267
 Approach 5 AM peak 190 08:05 - 09:05 PM peak 213 15:55 - 16:55 Daily Total 1661

Site: 43 Tuesday, 21 April 2026

Traffic Flow filename:NCITY_20260421.VS

Tuesday, 21 April 2026

Approach detector(s)...

Approach 1 1
Approach 2 2
Approach 3 3
Approach 4 4
Approach 5 5
Approach 6 6
Approach 7 7
Approach 8 8



00:15 Approach 1	6	6	12:00 Approach 1	57	57
00:15 Approach 2	6	6	12:00 Approach 2	22	22
00:15 Approach 3	8	8	12:00 Approach 3	70	70
00:15 Approach 4	1	1	12:00 Approach 4	13	13
00:15 Approach 5	23	23	12:00 Approach 5	84	84
00:15 Approach 6	8	8	12:00 Approach 6	42	42
00:15 Approach 7	12	12	12:00 Approach 7	82	82
00:15 Approach 8	10	10	12:00 Approach 8	12	12
00:30 Approach 1	3	3	12:15 Approach 1	53	53
00:30 Approach 2	8	8	12:15 Approach 2	17	17
00:30 Approach 3	5	5	12:15 Approach 3	64	64
00:30 Approach 4	2	2	12:15 Approach 4	24	24
00:30 Approach 5	16	16	12:15 Approach 5	93	93
00:30 Approach 6	6	6	12:15 Approach 6	53	53
00:30 Approach 7	13	13	12:15 Approach 7	78	78
00:30 Approach 8	7	7	12:15 Approach 8	11	11
00:45 Approach 1	3	3	12:30 Approach 1	49	49
00:45 Approach 2	5	5	12:30 Approach 2	16	16
00:45 Approach 3	6	6	12:30 Approach 3	67	67
00:45 Approach 4	4	4	12:30 Approach 4	25	25
00:45 Approach 5	12	12	12:30 Approach 5	110	110
00:45 Approach 6	3	3	12:30 Approach 6	41	41
00:45 Approach 7	7	7	12:30 Approach 7	100	100
00:45 Approach 8	3	3	12:30 Approach 8	8	8
01:00 Approach 1	1	1	12:45 Approach 1	46	46
01:00 Approach 2	5	5	12:45 Approach 2	18	18
01:00 Approach 3	9	9	12:45 Approach 3	53	53
01:00 Approach 4	0	0	12:45 Approach 4	16	16
01:00 Approach 5	10	10	12:45 Approach 5	122	122
01:00 Approach 6	2	2	12:45 Approach 6	61	61
01:00 Approach 7	5	5	12:45 Approach 7	77	77
01:00 Approach 8	4	4	12:45 Approach 8	11	11
01:15 Approach 1	0	0	13:00 Approach 1	51	51
01:15 Approach 2	5	5	13:00 Approach 2	11	11

01:15 Approach 3	4	4	13:00 Approach 3	92	92
01:15 Approach 4	1	1	13:00 Approach 4	30	30
01:15 Approach 5	13	13	13:00 Approach 5	96	96
01:15 Approach 6	2	2	13:00 Approach 6	43	43
01:15 Approach 7	9	9	13:00 Approach 7	74	74
01:15 Approach 8	5	5	13:00 Approach 8	13	13
01:30 Approach 1	1	1	13:15 Approach 1	50	50
01:30 Approach 2	1	1	13:15 Approach 2	18	18
01:30 Approach 3	3	3	13:15 Approach 3	52	52
01:30 Approach 4	0	0	13:15 Approach 4	17	17
01:30 Approach 5	7	7	13:15 Approach 5	100	100
01:30 Approach 6	2	2	13:15 Approach 6	43	43
01:30 Approach 7	7	7	13:15 Approach 7	81	81
01:30 Approach 8	7	7	13:15 Approach 8	11	11
01:45 Approach 1	2	2	13:30 Approach 1	56	56
01:45 Approach 2	2	2	13:30 Approach 2	11	11
01:45 Approach 3	1	1	13:30 Approach 3	74	74
01:45 Approach 4	0	0	13:30 Approach 4	28	28
01:45 Approach 5	7	7	13:30 Approach 5	102	102
01:45 Approach 6	5	5	13:30 Approach 6	54	54
01:45 Approach 7	5	5	13:30 Approach 7	88	88
01:45 Approach 8	1	1	13:30 Approach 8	8	8
02:00 Approach 1	0	0	13:45 Approach 1	51	51
02:00 Approach 2	2	2	13:45 Approach 2	14	14
02:00 Approach 3	2	2	13:45 Approach 3	72	72
02:00 Approach 4	0	0	13:45 Approach 4	24	24
02:00 Approach 5	9	9	13:45 Approach 5	110	110
02:00 Approach 6	4	4	13:45 Approach 6	64	64
02:00 Approach 7	3	3	13:45 Approach 7	84	84
02:00 Approach 8	3	3	13:45 Approach 8	14	14
02:15 Approach 1	2	2	14:00 Approach 1	50	50
02:15 Approach 2	3	3	14:00 Approach 2	26	26
02:15 Approach 3	2	2	14:00 Approach 3	81	81
02:15 Approach 4	0	0	14:00 Approach 4	20	20
02:15 Approach 5	8	8	14:00 Approach 5	106	106
02:15 Approach 6	6	6	14:00 Approach 6	48	48
02:15 Approach 7	8	8	14:00 Approach 7	89	89
02:15 Approach 8	7	7	14:00 Approach 8	8	8
02:30 Approach 1	1	1	14:15 Approach 1	46	46
02:30 Approach 2	4	4	14:15 Approach 2	12	12
02:30 Approach 3	5	5	14:15 Approach 3	65	65
02:30 Approach 4	0	0	14:15 Approach 4	19	19
02:30 Approach 5	8	8	14:15 Approach 5	106	106
02:30 Approach 6	4	4	14:15 Approach 6	64	64
02:30 Approach 7	4	4	14:15 Approach 7	85	85
02:30 Approach 8	2	2	14:15 Approach 8	11	11
02:45 Approach 1	1	1	14:30 Approach 1	49	49

02:45 Approach 2	1	1	14:30 Approach 2	18	18
02:45 Approach 3	2	2	14:30 Approach 3	54	54
02:45 Approach 4	0	0	14:30 Approach 4	15	15
02:45 Approach 5	3	3	14:30 Approach 5	99	99
02:45 Approach 6	4	4	14:30 Approach 6	44	44
02:45 Approach 7	1	1	14:30 Approach 7	67	67
02:45 Approach 8	1	1	14:30 Approach 8	16	16
03:00 Approach 1	1	1	14:45 Approach 1	45	45
03:00 Approach 2	0	0	14:45 Approach 2	16	16
03:00 Approach 3	0	0	14:45 Approach 3	75	75
03:00 Approach 4	0	0	14:45 Approach 4	30	30
03:00 Approach 5	3	3	14:45 Approach 5	107	107
03:00 Approach 6	0	0	14:45 Approach 6	50	50
03:00 Approach 7	1	1	14:45 Approach 7	90	90
03:00 Approach 8	3	3	14:45 Approach 8	11	11
03:15 Approach 1	1	1	15:00 Approach 1	67	67
03:15 Approach 2	2	2	15:00 Approach 2	16	16
03:15 Approach 3	2	2	15:00 Approach 3	73	73
03:15 Approach 4	0	0	15:00 Approach 4	14	14
03:15 Approach 5	2	2	15:00 Approach 5	100	100
03:15 Approach 6	2	2	15:00 Approach 6	41	41
03:15 Approach 7	5	5	15:00 Approach 7	84	84
03:15 Approach 8	1	1	15:00 Approach 8	8	8
03:30 Approach 1	0	0	15:15 Approach 1	46	46
03:30 Approach 2	1	1	15:15 Approach 2	14	14
03:30 Approach 3	6	6	15:15 Approach 3	99	99
03:30 Approach 4	1	1	15:15 Approach 4	40	40
03:30 Approach 5	3	3	15:15 Approach 5	119	119
03:30 Approach 6	5	5	15:15 Approach 6	45	45
03:30 Approach 7	9	9	15:15 Approach 7	74	74
03:30 Approach 8	3	3	15:15 Approach 8	10	10
03:45 Approach 1	2	2	15:30 Approach 1	58	58
03:45 Approach 2	3	3	15:30 Approach 2	17	17
03:45 Approach 3	1	1	15:30 Approach 3	69	69
03:45 Approach 4	1	1	15:30 Approach 4	23	23
03:45 Approach 5	9	9	15:30 Approach 5	112	112
03:45 Approach 6	2	2	15:30 Approach 6	47	47
03:45 Approach 7	1	1	15:30 Approach 7	94	94
03:45 Approach 8	2	2	15:30 Approach 8	9	9
04:00 Approach 1	3	3	15:45 Approach 1	46	46
04:00 Approach 2	2	2	15:45 Approach 2	7	7
04:00 Approach 3	1	1	15:45 Approach 3	75	75
04:00 Approach 4	1	1	15:45 Approach 4	10	10
04:00 Approach 5	6	6	15:45 Approach 5	110	110
04:00 Approach 6	4	4	15:45 Approach 6	38	38
04:00 Approach 7	8	8	15:45 Approach 7	54	54
04:00 Approach 8	3	3	15:45 Approach 8	13	13

04:15 Approach 1	0	0	16:00 Approach 1	51	51
04:15 Approach 2	2	2	16:00 Approach 2	16	16
04:15 Approach 3	5	5	16:00 Approach 3	67	67
04:15 Approach 4	2	2	16:00 Approach 4	22	22
04:15 Approach 5	6	6	16:00 Approach 5	111	111
04:15 Approach 6	8	8	16:00 Approach 6	51	51
04:15 Approach 7	7	7	16:00 Approach 7	36	36
04:15 Approach 8	2	2	16:00 Approach 8	9	9
04:30 Approach 1	2	2	16:15 Approach 1	50	50
04:30 Approach 2	3	3	16:15 Approach 2	18	18
04:30 Approach 3	2	2	16:15 Approach 3	84	84
04:30 Approach 4	2	2	16:15 Approach 4	36	36
04:30 Approach 5	12	12	16:15 Approach 5	85	85
04:30 Approach 6	6	6	16:15 Approach 6	28	28
04:30 Approach 7	11	11	16:15 Approach 7	39	39
04:30 Approach 8	3	3	16:15 Approach 8	11	11
04:45 Approach 1	3	3	16:30 Approach 1	51	51
04:45 Approach 2	7	7	16:30 Approach 2	11	11
04:45 Approach 3	6	6	16:30 Approach 3	84	84
04:45 Approach 4	2	2	16:30 Approach 4	38	38
04:45 Approach 5	12	12	16:30 Approach 5	119	119
04:45 Approach 6	12	12	16:30 Approach 6	36	36
04:45 Approach 7	19	19	16:30 Approach 7	35	35
04:45 Approach 8	7	7	16:30 Approach 8	9	9
05:00 Approach 1	2	2	16:45 Approach 1	33	33
05:00 Approach 2	4	4	16:45 Approach 2	17	17
05:00 Approach 3	4	4	16:45 Approach 3	65	65
05:00 Approach 4	0	0	16:45 Approach 4	28	28
05:00 Approach 5	27	27	16:45 Approach 5	110	110
05:00 Approach 6	11	11	16:45 Approach 6	40	40
05:00 Approach 7	17	17	16:45 Approach 7	15	15
05:00 Approach 8	9	9	16:45 Approach 8	9	9
05:15 Approach 1	3	3	17:00 Approach 1	55	55
05:15 Approach 2	4	4	17:00 Approach 2	15	15
05:15 Approach 3	5	5	17:00 Approach 3	96	96
05:15 Approach 4	0	0	17:00 Approach 4	31	31
05:15 Approach 5	11	11	17:00 Approach 5	104	104
05:15 Approach 6	10	10	17:00 Approach 6	35	35
05:15 Approach 7	19	19	17:00 Approach 7	50	50
05:15 Approach 8	3	3	17:00 Approach 8	13	13
05:30 Approach 1	7	7	17:15 Approach 1	69	69
05:30 Approach 2	5	5	17:15 Approach 2	22	22
05:30 Approach 3	1	1	17:15 Approach 3	87	87
05:30 Approach 4	0	0	17:15 Approach 4	33	33
05:30 Approach 5	28	28	17:15 Approach 5	99	99
05:30 Approach 6	21	21	17:15 Approach 6	36	36
05:30 Approach 7	22	22	17:15 Approach 7	43	43

05:30 Approach 8	7	7	17:15 Approach 8	7	7
05:45 Approach 1	11	11	17:30 Approach 1	69	69
05:45 Approach 2	6	6	17:30 Approach 2	15	15
05:45 Approach 3	15	15	17:30 Approach 3	80	80
05:45 Approach 4	10	10	17:30 Approach 4	30	30
05:45 Approach 5	24	24	17:30 Approach 5	97	97
05:45 Approach 6	41	41	17:30 Approach 6	29	29
05:45 Approach 7	19	19	17:30 Approach 7	21	21
05:45 Approach 8	3	3	17:30 Approach 8	12	12
06:00 Approach 1	13	13	17:45 Approach 1	62	62
06:00 Approach 2	8	8	17:45 Approach 2	21	21
06:00 Approach 3	11	11	17:45 Approach 3	75	75
06:00 Approach 4	6	6	17:45 Approach 4	30	30
06:00 Approach 5	38	38	17:45 Approach 5	116	116
06:00 Approach 6	48	48	17:45 Approach 6	50	50
06:00 Approach 7	26	26	17:45 Approach 7	38	38
06:00 Approach 8	5	5	17:45 Approach 8	13	13
06:15 Approach 1	20	20	18:00 Approach 1	59	59
06:15 Approach 2	12	12	18:00 Approach 2	12	12
06:15 Approach 3	17	17	18:00 Approach 3	83	83
06:15 Approach 4	2	2	18:00 Approach 4	37	37
06:15 Approach 5	49	49	18:00 Approach 5	122	122
06:15 Approach 6	69	69	18:00 Approach 6	35	35
06:15 Approach 7	41	41	18:00 Approach 7	42	42
06:15 Approach 8	4	4	18:00 Approach 8	9	9
06:30 Approach 1	22	22	18:15 Approach 1	63	63
06:30 Approach 2	13	13	18:15 Approach 2	14	14
06:30 Approach 3	21	21	18:15 Approach 3	89	89
06:30 Approach 4	3	3	18:15 Approach 4	30	30
06:30 Approach 5	74	74	18:15 Approach 5	118	118
06:30 Approach 6	75	75	18:15 Approach 6	38	38
06:30 Approach 7	75	75	18:15 Approach 7	62	62
06:30 Approach 8	6	6	18:15 Approach 8	8	8
06:45 Approach 1	49	49	18:30 Approach 1	70	70
06:45 Approach 2	17	17	18:30 Approach 2	15	15
06:45 Approach 3	26	26	18:30 Approach 3	89	89
06:45 Approach 4	4	4	18:30 Approach 4	22	22
06:45 Approach 5	91	91	18:30 Approach 5	107	107
06:45 Approach 6	88	88	18:30 Approach 6	40	40
06:45 Approach 7	71	71	18:30 Approach 7	50	50
06:45 Approach 8	7	7	18:30 Approach 8	9	9
07:00 Approach 1	49	49	18:45 Approach 1	54	54
07:00 Approach 2	14	14	18:45 Approach 2	14	14
07:00 Approach 3	33	33	18:45 Approach 3	101	101
07:00 Approach 4	5	5	18:45 Approach 4	23	23
07:00 Approach 5	93	93	18:45 Approach 5	98	98
07:00 Approach 6	90	90	18:45 Approach 6	38	38

07:00 Approach 7	71	71	18:45 Approach 7	45	45
07:00 Approach 8	10	10	18:45 Approach 8	11	11
07:15 Approach 1	61	61	19:00 Approach 1	52	52
07:15 Approach 2	14	14	19:00 Approach 2	13	13
07:15 Approach 3	40	40	19:00 Approach 3	89	89
07:15 Approach 4	11	11	19:00 Approach 4	34	34
07:15 Approach 5	98	98	19:00 Approach 5	100	100
07:15 Approach 6	80	80	19:00 Approach 6	46	46
07:15 Approach 7	79	79	19:00 Approach 7	59	59
07:15 Approach 8	11	11	19:00 Approach 8	15	15
07:30 Approach 1	61	61	19:15 Approach 1	60	60
07:30 Approach 2	13	13	19:15 Approach 2	23	23
07:30 Approach 3	78	78	19:15 Approach 3	69	69
07:30 Approach 4	21	21	19:15 Approach 4	17	17
07:30 Approach 5	89	89	19:15 Approach 5	108	108
07:30 Approach 6	62	62	19:15 Approach 6	45	45
07:30 Approach 7	91	91	19:15 Approach 7	90	90
07:30 Approach 8	9	9	19:15 Approach 8	10	10
07:45 Approach 1	77	77	19:30 Approach 1	45	45
07:45 Approach 2	14	14	19:30 Approach 2	15	15
07:45 Approach 3	90	90	19:30 Approach 3	81	81
07:45 Approach 4	25	25	19:30 Approach 4	24	24
07:45 Approach 5	65	65	19:30 Approach 5	130	130
07:45 Approach 6	45	45	19:30 Approach 6	49	49
07:45 Approach 7	88	88	19:30 Approach 7	89	89
07:45 Approach 8	9	9	19:30 Approach 8	20	20
08:00 Approach 1	92	92	19:45 Approach 1	34	34
08:00 Approach 2	10	10	19:45 Approach 2	20	20
08:00 Approach 3	69	69	19:45 Approach 3	75	75
08:00 Approach 4	24	24	19:45 Approach 4	18	18
08:00 Approach 5	100	100	19:45 Approach 5	105	105
08:00 Approach 6	50	50	19:45 Approach 6	44	44
08:00 Approach 7	97	97	19:45 Approach 7	54	54
08:00 Approach 8	3	3	19:45 Approach 8	10	10
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08:15 Approach 5	35	35	20:00 Approach 5	99	99
08:15 Approach 6	27	27	20:00 Approach 6	41	41
08:15 Approach 7	84	84	20:00 Approach 7	82	82
08:15 Approach 8	8	8	20:00 Approach 8	14	14
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08:30 Approach 2	6	6	20:15 Approach 2	18	18
08:30 Approach 3	81	81	20:15 Approach 3	63	63
08:30 Approach 4	17	17	20:15 Approach 4	20	20
08:30 Approach 5	87	87	20:15 Approach 5	93	93

08:30 Approach 6	20	20	20:15 Approach 6	51	51
08:30 Approach 7	67	67	20:15 Approach 7	76	76
08:30 Approach 8	10	10	20:15 Approach 8	14	14
08:45 Approach 1	75	75	20:30 Approach 1	51	51
08:45 Approach 2	12	12	20:30 Approach 2	17	17
08:45 Approach 3	78	78	20:30 Approach 3	48	48
08:45 Approach 4	14	14	20:30 Approach 4	14	14
08:45 Approach 5	105	105	20:30 Approach 5	101	101
08:45 Approach 6	31	31	20:30 Approach 6	54	54
08:45 Approach 7	51	51	20:30 Approach 7	83	83
08:45 Approach 8	9	9	20:30 Approach 8	14	14
09:00 Approach 1	93	93	20:45 Approach 1	26	26
09:00 Approach 2	12	12	20:45 Approach 2	13	13
09:00 Approach 3	109	109	20:45 Approach 3	59	59
09:00 Approach 4	18	18	20:45 Approach 4	15	15
09:00 Approach 5	78	78	20:45 Approach 5	89	89
09:00 Approach 6	46	46	20:45 Approach 6	47	47
09:00 Approach 7	45	45	20:45 Approach 7	68	68
09:00 Approach 8	9	9	20:45 Approach 8	7	7
09:15 Approach 1	74	74	21:00 Approach 1	40	40
09:15 Approach 2	23	23	21:00 Approach 2	14	14
09:15 Approach 3	103	103	21:00 Approach 3	41	41
09:15 Approach 4	30	30	21:00 Approach 4	14	14
09:15 Approach 5	88	88	21:00 Approach 5	71	71
09:15 Approach 6	49	49	21:00 Approach 6	31	31
09:15 Approach 7	73	73	21:00 Approach 7	63	63
09:15 Approach 8	13	13	21:00 Approach 8	7	7
09:30 Approach 1	75	75	21:15 Approach 1	25	25
09:30 Approach 2	15	15	21:15 Approach 2	14	14
09:30 Approach 3	60	60	21:15 Approach 3	40	40
09:30 Approach 4	22	22	21:15 Approach 4	7	7
09:30 Approach 5	88	88	21:15 Approach 5	69	69
09:30 Approach 6	58	58	21:15 Approach 6	27	27
09:30 Approach 7	73	73	21:15 Approach 7	68	68
09:30 Approach 8	12	12	21:15 Approach 8	11	11
09:45 Approach 1	61	61	21:30 Approach 1	24	24
09:45 Approach 2	17	17	21:30 Approach 2	18	18
09:45 Approach 3	65	65	21:30 Approach 3	30	30
09:45 Approach 4	21	21	21:30 Approach 4	9	9
09:45 Approach 5	97	97	21:30 Approach 5	66	66
09:45 Approach 6	59	59	21:30 Approach 6	46	46
09:45 Approach 7	79	79	21:30 Approach 7	58	58
09:45 Approach 8	6	6	21:30 Approach 8	14	14
10:00 Approach 1	68	68	21:45 Approach 1	14	14
10:00 Approach 2	22	22	21:45 Approach 2	9	9
10:00 Approach 3	66	66	21:45 Approach 3	29	29
10:00 Approach 4	23	23	21:45 Approach 4	11	11

10:00 Approach 5	103	103	21:45 Approach 5	67	67
10:00 Approach 6	68	68	21:45 Approach 6	34	34
10:00 Approach 7	81	81	21:45 Approach 7	58	58
10:00 Approach 8	15	15	21:45 Approach 8	7	7
10:15 Approach 1	49	49	22:00 Approach 1	21	21
10:15 Approach 2	15	15	22:00 Approach 2	12	12
10:15 Approach 3	76	76	22:00 Approach 3	14	14
10:15 Approach 4	28	28	22:00 Approach 4	8	8
10:15 Approach 5	87	87	22:00 Approach 5	56	56
10:15 Approach 6	58	58	22:00 Approach 6	42	42
10:15 Approach 7	79	79	22:00 Approach 7	74	74
10:15 Approach 8	13	13	22:00 Approach 8	16	16
10:30 Approach 1	57	57	22:15 Approach 1	8	8
10:30 Approach 2	14	14	22:15 Approach 2	10	10
10:30 Approach 3	70	70	22:15 Approach 3	23	23
10:30 Approach 4	22	22	22:15 Approach 4	11	11
10:30 Approach 5	89	89	22:15 Approach 5	70	70
10:30 Approach 6	62	62	22:15 Approach 6	34	34
10:30 Approach 7	74	74	22:15 Approach 7	56	56
10:30 Approach 8	11	11	22:15 Approach 8	11	11
10:45 Approach 1	59	59	22:30 Approach 1	13	13
10:45 Approach 2	18	18	22:30 Approach 2	8	8
10:45 Approach 3	65	65	22:30 Approach 3	23	23
10:45 Approach 4	24	24	22:30 Approach 4	7	7
10:45 Approach 5	100	100	22:30 Approach 5	58	58
10:45 Approach 6	64	64	22:30 Approach 6	25	25
10:45 Approach 7	60	60	22:30 Approach 7	49	49
10:45 Approach 8	5	5	22:30 Approach 8	7	7
11:00 Approach 1	57	57	22:45 Approach 1	14	14
11:00 Approach 2	18	18	22:45 Approach 2	13	13
11:00 Approach 3	73	73	22:45 Approach 3	16	16
11:00 Approach 4	30	30	22:45 Approach 4	6	6
11:00 Approach 5	100	100	22:45 Approach 5	47	47
11:00 Approach 6	49	49	22:45 Approach 6	23	23
11:00 Approach 7	101	101	22:45 Approach 7	28	28
11:00 Approach 8	6	6	22:45 Approach 8	9	9
11:15 Approach 1	43	43	23:00 Approach 1	12	12
11:15 Approach 2	11	11	23:00 Approach 2	12	12
11:15 Approach 3	63	63	23:00 Approach 3	11	11
11:15 Approach 4	19	19	23:00 Approach 4	2	2
11:15 Approach 5	89	89	23:00 Approach 5	44	44
11:15 Approach 6	49	49	23:00 Approach 6	26	26
11:15 Approach 7	89	89	23:00 Approach 7	26	26
11:15 Approach 8	23	23	23:00 Approach 8	10	10
11:30 Approach 1	42	42	23:15 Approach 1	8	8
11:30 Approach 2	16	16	23:15 Approach 2	12	12
11:30 Approach 3	56	56	23:15 Approach 3	19	19

11:30 Approach 4	27	27	23:15 Approach 4	3	3
11:30 Approach 5	87	87	23:15 Approach 5	37	37
11:30 Approach 6	35	35	23:15 Approach 6	15	15
11:30 Approach 7	115	115	23:15 Approach 7	27	27
11:30 Approach 8	45	45	23:15 Approach 8	9	9
11:45 Approach 1	44	44	23:30 Approach 1	10	10
11:45 Approach 2	20	20	23:30 Approach 2	12	12
11:45 Approach 3	71	71	23:30 Approach 3	15	15
11:45 Approach 4	24	24	23:30 Approach 4	3	3
11:45 Approach 5	100	100	23:30 Approach 5	29	29
11:45 Approach 6	54	54	23:30 Approach 6	15	15
11:45 Approach 7	85	85	23:30 Approach 7	17	17
11:45 Approach 8	12	12	23:30 Approach 8	3	3
			23:45 Approach 1	8	8
			23:45 Approach 2	5	5
			23:45 Approach 3	6	6
			23:45 Approach 4	1	1
			23:45 Approach 5	17	17
			23:45 Approach 6	10	10
			23:45 Approach 7	26	26
			23:45 Approach 8	4	4
			24:00 Approach 1	4	4
			24:00 Approach 2	9	9
			24:00 Approach 3	7	7
			24:00 Approach 4	1	1
			24:00 Approach 5	18	18
			24:00 Approach 6	10	10
			24:00 Approach 7	22	22
			24:00 Approach 8	5	5

Approach 1 AM peak 373 07:50 - 08:50 PM peak 274 17:10 - 18:10 Daily Total 3551
 Approach 2 AM peak 77 09:00 - 10:00 PM peak 78 16:40 - 17:40 Daily Total 1147
 Approach 3 AM peak 380 08:10 - 09:10 PM peak 368 18:00 - 19:00 Daily Total 4568
 Approach 4 AM peak 106 10:05 - 11:05 PM peak 137 16:25 - 17:25 Daily Total 1417
 Approach 5 AM peak 391 09:50 - 10:50 PM peak 474 17:20 - 18:20 Daily Total 6725
 Approach 6 AM peak 335 06:05 - 07:05 PM peak 237 13:20 - 14:20 Daily Total 3453
 Approach 7 AM peak 390 10:45 - 11:45 PM peak 346 13:15 - 14:15 Daily Total 4957
 Approach 8 AM peak 94 10:55 - 11:55 PM peak 58 18:40 - 19:40 Daily Total 868

C. TRICS database



Audit Code: 583463c3-ac75-4b19-8edd-130393cb2a6f

TRIP RATE CALCULATION SELECTION PARAMETERS:

Land Use: 03 - RESIDENTIAL

Category: C - FLATS PRIVATELY OWNED

Selected Vehicle Type: Total Vehicles

Selected regions and areas:

01	GREATER LONDON		
	EG	EALING	1 day
	HM	HAMMERSMITH AND FULHAM	1 day
	IS	ISLINGTON	1 day
	KI	KINGSTON	1 day
07	YORKSHIRE & NORTH LINCOLNSHIRE		
	LS	LEEDS	1 day
08	NORTH WEST		
	GM	GREATER MANCHESTER	1 day
	MS	MERSEYSIDE	1 day

This section displays the number of survey days per TRICS® sub-region in the selected set.

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Primary Filtering Selection:

This data displays the chosen trip rate parameter and its selected range. Only sites that fall within the parameter range are included in the trip rate calculation.

Parameter:	DWELLS
Actual Range:	102 to 194 (units:DWELLS)
Range Selected by User:	100 to 200 (units:DWELLS)
Parking Spaces Range:	0 - 550

Public Transport Provision:

Selection by:	All Surveys Included
Date Range:	19/07/91 to 26/11/25

This data displays the range of survey dates selected. Only surveys that were conducted within this date range are included in the trip rate calculation.

Selected survey days:

Thursday	3 days
Tuesday	4 days

This data displays the number of selected surveys by day of the week.

Selected survey types:

Manual count	7
Direction ATC Count	0

This data displays the number of manual classified surveys and the number of unclassified ATC surveys, the total adding up to the overall number of surveys in the selected set. Manual surveys are undertaken using staff, whilst ATC surveys are undertaken using machines

Selected Locations:

Edge of Town Centre	4 days
Town Centre	3 days

This data displays the number of surveys per main location category within the selected set. The main location categories consist of Free Standing, Edge of Town, Suburban Area, Neighbourhood Centre, Edge of Town Centre, Town Centre and Not Known.

Selected Location Sub Categories:

Built-Up Zone	3 days
Development Zone	3 days
Residential Zone	1 days

This data displays the number of surveys per location sub-category within the selected set. The location sub-categories consist of Commercial Zone, Industrial Zone, Development Zone, Residential Zone, Retail Zone, Built-Up Zone, Village, Out of Town, High Street and No Sub Category.

Inclusion of Servicing Vehicle Counts:

Servicing vehicles Included	2 days
Servicing vehicles Unknown	5 days



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Secondary Filtering Selection:

Use Class:

C3 7 surveys

This data displays the number of surveys per Use Class classification within the selected set. The Use Classes Order (England) 2020 has been used for this purpose, which can be found within the Library module of TRICS®.

Population within 500m Range:

1080 - 14642

Population within 1 mile:

10,001 to 15,000	2 surveys
100,001 or More	1 surveys
15,001 to 20,000	1 surveys
25,001 to 50,000	2 surveys
50,001 to 100,000	1 surveys

This data displays the number of selected surveys within stated 1-mile radii of population.

Population within 5 miles:

250,001 to 500,000	1 surveys
500,001 or More	6 surveys

This data displays the number of selected surveys within stated 5-mile radii of population.

Car ownership within 5 miles:

0.5 or Less	2 surveys
0.6 to 1.0	5 surveys

This data displays the number of selected surveys within stated ranges of average cars owned per residential dwelling, within a radius of 5-miles of selected survey sites.



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Petrol filling station:

This data displays the number of surveys within the selected set that include petrol filling station activity, and the number of surveys that do not.

Travel Plan:

No	5 surveys
Yes	2 surveys

This data displays the number of surveys within the selected set that were undertaken at sites with Travel Plans in place, and the number of surveys that were undertaken at sites without Travel Plans.

PTAL Rating:

5 - Very good	1 surveys
6b - Excellent	1 surveys
No PTAL Present	5 surveys

This data displays the number of surveys within the selected set by PTAL rating category.

COVID-19 Restrictions:

No

Audit Code: 583463c3-ac75-4b19-8edd-130393cb2a6f

1	EG-03-C-02	BLOCKS OF FLATS	EALING
A406 HANGER LANE EALING Edge of Town Centre Residential Zone Number of dwellings: 132.00 DWELLS Survey date: Survey Type: Manual			
2	GM-03-C-02	BLOCK OF FLATS	GREATER MANCHESTER
WHITWORTH STREET W. MANCHESTER Town Centre Built-Up Zone Number of dwellings: 154.00 DWELLS Survey date: Thursday 13/10/2011 Survey Type: Manual			
3	HM-03-C-02	BLOCKS OF FLATS	HAMMERSMITH AND FULHAM
GLENTHORNE ROAD HAMMERSMITH Town Centre Built-Up Zone Number of dwellings: 194.00 DWELLS Survey date: Survey Type: Manual			
4	IS-03-C-09	BLOCK OF FLATS	ISLINGTON
CITY ROAD ISLINGTON Edge of Town Centre Development Zone Number of dwellings: 190.00 DWELLS Survey date: Survey Type: Manual			
5	KI-03-C-01	BLOCKS OF FLATS	KINGSTON
SOPWITH WAY KINGSTON-UPON-THAMES Town Centre Built-Up Zone Number of dwellings: 132.00 DWELLS Survey date: Survey Type: Manual			
6	LS-03-C-01	BLOCK OF FLATS	LEEDS
EAST STREET LEEDS CROWN POINT Edge of Town Centre Development Zone Number of dwellings: 127.00 DWELLS Survey date: Thursday 13/11/2003 Survey Type: Manual			
7	MS-03-C-01	BLOCKS OF FLATS	MERSEYSIDE
WAPPING ROAD LIVERPOOL WAPPING DOCK Edge of Town Centre Development Zone Number of dwellings: 114.00 DWELLS Survey date: Thursday 16/10/2003 Survey Type: Manual			

DESELECTED SURVEYS

Audit Code: 583463c3-ac75-4b19-8edd-130393cb2a6f

Site Ref	Survey Date	Reason for Deselection
BY-03-C-01 08-09-2020	08-09-2020	Small Town
CT-03-C-01 15-05-2018	15-05-2018	Small Town
IS-03-C-04 14-07-2016	14-07-2016	Removed: Site re-surveyed by IS-03-C-07
IS-03-C-07 06-06-2019	06-06-2019	Removed: Site re-surveyed by IS-03-C-08
IS-03-C-08 20-10-2022	20-10-2022	Removed: Site re-surveyed by IS-03-C-09

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TRIP RATE for Land Use 03 - RESIDENTIAL/C - FLATS PRIVATELY OWNED

Total Vehicles

Calculation factor: 1 DWELLS

**BOLD print indicates peak (busiest) period*

Time Range	No. Days	Ave. DWELLS	Arrivals	Departures	Totals
00:00-01:00					
01:00-02:00					
02:00-03:00					
03:00-04:00					
04:00-05:00					
05:00-06:00					
06:00-07:00	1	190	0.011	0.011	0.022
07:00-08:00	7	149	0.021	0.071	0.092
08:00-09:00	7	149	0.039	0.094	0.133
09:00-10:00	7	149	0.055	0.067	0.122
10:00-11:00	7	149	0.037	0.055	0.092
11:00-12:00	7	149	0.034	0.042	0.076
12:00-13:00	7	149	0.041	0.041	0.082
13:00-14:00	7	149	0.032	0.042	0.074
14:00-15:00	7	149	0.037	0.030	0.067
15:00-16:00	7	149	0.040	0.040	0.080
16:00-17:00	7	149	0.051	0.035	0.086
17:00-18:00	7	149	0.069	0.041	0.110
18:00-19:00	7	149	0.083	0.046	0.129
19:00-20:00	2	192	0.047	0.044	0.091
20:00-21:00	2	192	0.026	0.026	0.052
21:00-22:00	1	190	0.011	0.016	0.027
22:00-23:00					
23:00-00:00					
Total Rates:			0.634	0.701	1.335

This section displays the trip rate results based on the selected set of surveys and the selected count type (shown just above the table). It is split by three main columns, representing arrivals trips, departures trips, and total trips (arrivals plus departures). Within each of these main columns are three sub-columns. These display the number of survey days where count data is included (per time period), the average value of the selected trip rate calculation parameter (per time period), and the trip rate result (per time period). Total trip rates (the sum of the column) are also displayed at the foot of the table.

To obtain a trip rate, the average (mean) trip rate parameter value (TRP) is first calculated for all selected survey days that have count data available for the stated time period. The average (mean) number of arrivals, departures or totals (whichever applies) is also calculated (COUNT) for all selected survey days that have count data available for the stated time period. Then, the average count is divided by the average trip rate parameter value, and multiplied by the stated calculation factor (shown just above the table and abbreviated here as FACT). So, the method is: $COUNT/TRP \times FACT$. Trip rates are then rounded to 3 decimal places.

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Audit Code: 583463c3-ac75-4b19-8edd-130393cb2a6f

Parameter Summary:

Trip rate parameter range selected:	100 - 200 (units: DWELLS)
Survey date date range:	26/06/2001 - 22/10/2024
Number of weekdays (Monday-Friday):	7
Number of Saturdays:	0
Number of Sundays:	0
Surveys automatically removed from selection:	5
Surveys manually removed from selection:	0

This section displays a quick summary of some of the data filtering selections made by the TRICS® user. The trip rate calculation parameter range of all selected surveys is displayed first, followed by the range of minimum and maximum survey dates selected by the user. Then, the total number of selected weekdays and weekend days in the selected set of surveys are show. Finally, the number of survey days that have been manually removed from the selected set outside of the standard filtering procedure are displayed.

UK and Ireland Office Locations

