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Supporting Information

Derogation Licence in support of the Royal Canal Urban Greenway

16 September 2026

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Introduction

Objectives

The Proposed Scheme consists of the construction of an approximately 8.1km shared pedestrian and cycle greenway along and adjacent to the Royal Canal towpath, extending from the Kildare County Council boundary in the west at Confey Slipway to Talbot Bridge (12th Lock at Old Navan Road) in the east, where it will tie into the completed Ashtown Greenway. The cycleway is for the exclusive use of pedal cyclists and pedestrians. The Proposed Scheme (Figure 1) will provide the missing link between the urban and rural sections of the Greenway already completed.

This form relates to an application for a derogation license for a breeding holt that was identified to the west of the Proposed Scheme.

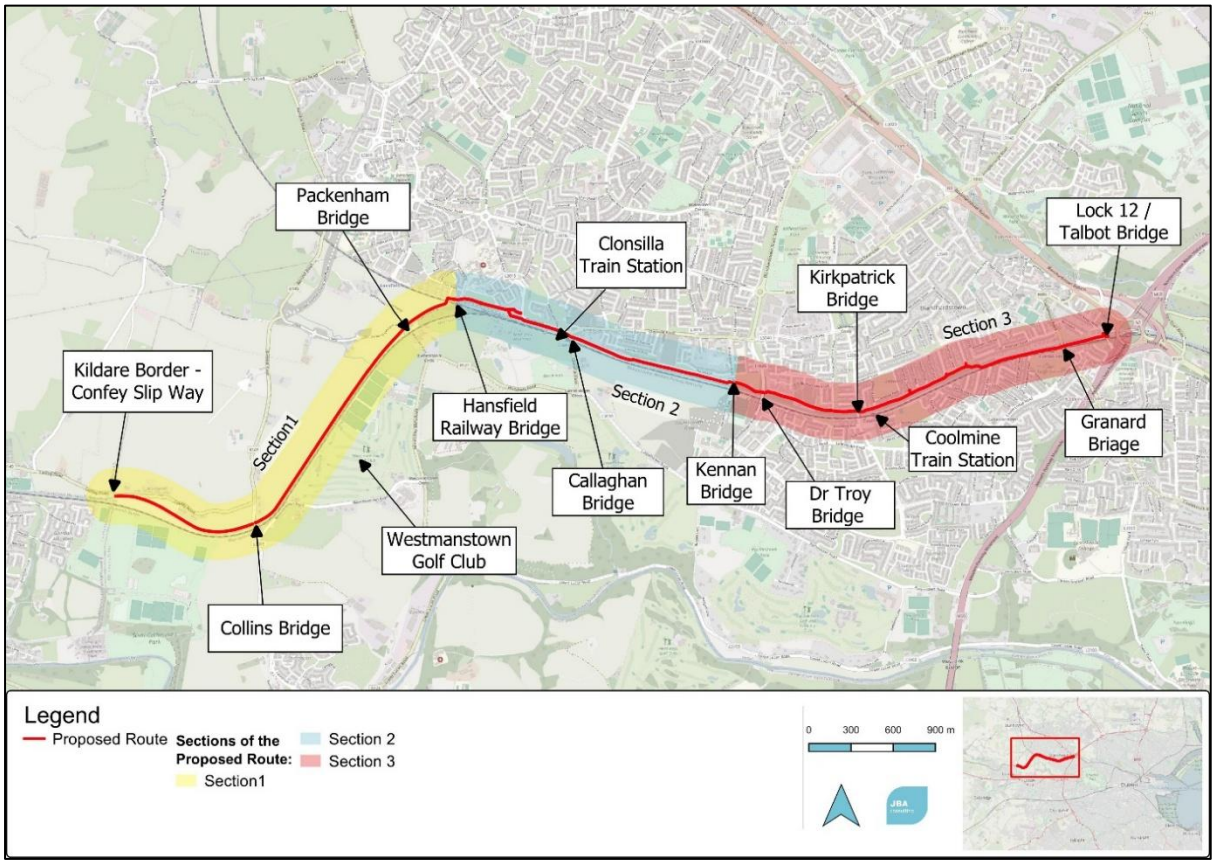


Figure 1: Site location and boundary.

Competent Persons

This application was prepared by Jai Dolan (BSc (Hons), MSc) and Abbie Doyle (BSc (Hons), MSc). Jai is an Ecologist with JBA Consulting more than two years' experience in ecological consultancy. Abbie is a Graduate Ecologist with JBA Consulting with nine months experience in ecological consultancy.

The Otter surveys were carried out by Dr Ross Macklin (BSc, PhD, MCIEEM) of Triturus Environmental Ltd. Ross is an Ecologist and Fisheries Scientist with over twenty years' experience in ecological consultancy.

The application was reviewed by William Mulville BSc (Hons) Zoology, MSc, MCIEEM. William is a Senior Ecologist with JBA Consulting, with over 9 years' experience in ecological research, endangered species conservation and ecological consultancy, who specialises in mustelid ecology.

Background

The Royal Canal Urban Greenway is a 8.1km pedestrian and cycle route which is to be constructed along or adjacent to the Royal Canal as it heads eastwards from the Kildare County Boundary at Confey Slipway to Talbot Bridge, (Old Navan Road, near 12th Lock) where it will tie into the completed Ashtown Greenway. The Proposed Scheme forms part of the strategic Dublin–Galway cycle corridor (266 km), first identified in the National Cycle Network Scoping Study 2010, and will complete the missing link in the Royal Canal Greenway between Maynooth and Spencer Dock, Dublin.

The proposed greenway is a joint scheme. Fingal County Council (the Client) is the scheme promoter in conjunction with the National Transport Authority (NTA) as the funding body and Waterways Ireland (WI), who are the principal property owner. The greenway is for the exclusive use of pedal cyclists and pedestrians.

The Proposed Scheme will provide a high-quality, safe, attractive and environmentally sensitive walking and cycling corridor serving Castleknock, Blanchardstown, Clonsilla, Coolmine, and the wider Dublin 15 area. This significant new amenity will encourage recreation while offering an attractive sustainable transport option for residents and commuters, delivering environmental, economic and health benefits. The Proposed Scheme will provide an important active travel and recreational corridor supporting sustainable mobility, connectivity and accessibility across the wider area.

Construction of this section of the Royal Canal greenway will be of long-term public interest, providing a benefit regionally, and nationally.

The proposed Scheme has been guided by and delivers on a broad range of national, regional, and local policy, as listed below

National Policies	• National Planning Framework (NPF): Project Ireland 2040 - Revision (2025) • National Development Plan (2018-2027) • Climate Action Plan (2025)
Regional and Sectoral Policies	• Strategy for the Future Development of National and Regional Greenways (2018) • Greenways and Cycle Routes Ancillary Infrastructure Guidelines (2022) • Waterways Ireland Heritage Plan (2016–2020) • Waterways Ireland Heritage & Biodiversity Plan 2030 (Draft) • Spatial and Economic Strategy for the Eastern and Midland Region • National Cycle Network Plan 2023 • Transport Strategy for the Greater Dublin Area (2016–2035) • Transport Strategy for the Greater Dublin Area (2022–2042) • Greater Dublin Area Cycle Network Plan (2022) • National Physical Activity Plan 2016
Local Policies	• Fingal County Development Plan 2023 - 2029

Site Description

Royal Canal Greenway

The Royal Canal Urban Greenway is a pedestrian and cycle route which is to be constructed along or adjacent to the Royal Canal as it heads easwards from the Kildare County Boundary at Confey Slipway to Talbot Bridge, (Old Navan Road, near 12th Lock).

The Proposed Scheme will be carried out on lands owned by Waterways Ireland. No previous planning applications have been submitted within the scheme boundary.

The Proposed Scheme starts at the Kildare County Boundary and runs 8.1km eastwards to the Old Navan Road (near the 12th Lock). The Proposed Scheme has been divided into three distinct sections based on their different geographical and physical characteristics:

Section 1 – Kildare County Border to Hansfield Railway Bridge (Ch. 0000m – 3200m):

Section 1 extends from the Kildare/Dublin County Boundary to Hansfield Railway Bridge. This section is rural/peri-urban in nature and is predominantly characterised by farmland, with local amenities including Westmanstown Golf Club and Westmanstown Sports Centre located nearby.

Section 2 – Hansfield Railway Bridge to Kennan Bridge (Ch. 3200m – 5300m):

Section 2 extends from Hansfield Railway Bridge, through Clonsilla under Callaghan Bridge to Kennan Bridge at Porterstown Road. In Section 2, the character of the area changes from rural to predominantly suburban in nature. This section is predominately residential on the northern side of the canal with farmlands on the southern side.

Section 3 – Kennan Bridge to Talbot Bridge (Ch 5300m – 8100m):

Section 3 runs from Kennan Bridge (Porterstown Road) to Talbot Bridge (Old Navan Road). This section is predominately urban with extensive residential catchments on both sides of the Canal.

Policy Context

Policy and legislation for nature conservation; and protected and priority species, i.e. Otter *Lutra lutra*, relevant to the proposed scheme is provided below.

Biodiversity Policy and Guidance

Ireland's 4th National Biodiversity Action Plan 2023-2030 (NBAP) (DoHLGH, 2024) sets the national biodiversity agenda for the period 2023-2030 and aims to deliver the transformative changes required to the ways in which we value and protect nature.

The 4th NBAP endeavours for a "whole of government, whole of society" approach to the governance and conservation of biodiversity. The aim is to ensure that every citizen, community, business (including developers), local authority, semi-state and state agency has an awareness of biodiversity and its importance, and of the implications of its loss, while also understanding how they can act to address the biodiversity emergency as part of a renewed national effort to "act for nature".

This NBAP 2023-2030 builds upon the achievements of the previous Plan. It will continue to implement actions within the framework of five strategic objectives, with the first two objectives of particular relevance to the production of this Otter derogation licence application.

- Objective 1 - Adopt a Whole of Government, Whole of Society Approach to Biodiversity
- Objective 2 - Meet Urgent Conservation and Restoration Needs
- Objective 3 - Secure Nature's Contribution to People
- Objective 4 - Enhance the Evidence Base for Action on Biodiversity
- Objective 5 - Strengthen Ireland's Contribution to International Biodiversity Initiatives.

The Wildlife (Amendment) Act 2023 introduced a new public sector duty on biodiversity. The legislation provides that every public body, as listed in the Act, is obliged to have regard to the objectives and targets in the National Biodiversity Action Plan.

As part of the Action Plan process Local Authorities (LA) must produce Biodiversity Action Plans (BAP). BAPs highlight local biodiversity issues and set out a series of objectives and action plans for the conservation of priority species and habitats where they occur in each district or county.

Irish Wildlife Acts

A number of species, including Otter, are protected under Irish legislation. In Ireland, a primary protection is provided under the Wildlife Acts 1976-2021 and the Wildlife (Amendment) Act 2023.

EU Habitats Directive

The Habitats Directive (Council Directive 92/43/EEC) was adopted in 1992 and transposed into Irish legislation in 1997. This directive outlines protection for over 1000 species and 230 habitat types across Europe, including Otter and its associated habitats. Otter is specifically afforded protection under Annex II (requiring Special Areas of Conservation) and Annex IV (strict protection).

Zoning

The proposed scheme extends for approximately 8.1 km along the Royal Canal and has been divided into three sections. The Royal Canal watercourse itself is zoned Active Open Space, with the objective of preserving and providing for open space and recreational amenities.

Section 1 is predominantly bounded by lands zoned Green Belt to the north of the canal, with zoning objectives relating to conservation, amenity provision, buffer space, landscape protection, and ecological corridors. A portion of land at the eastern end of Section 1, located north of the canal along the proposed route, is zoned Active Open Space. Lands to the south of the canal within this section are primarily zoned High Amenity.

Section 2 contains a more varied zoning pattern. Lands to the south of the canal comprise a mix of High Amenity and Residential Area zoning. To the north of the canal, zoning includes Active Open Space, Residential Area (both existing and proposed residential lands), Town and District Centre, and Community Infrastructure.

Section 3 is characterised by a combination of Active Open Space and Residential Area zoning on lands north and south of the Royal Canal.

Proposed works

The proposed greenway route is approximately 8.1km in length. Approximately 5km of the route will be along the canal towpath, while 3.1km of the greenway will be away from the towpath, reflecting local constraints including trees, habitats and existing topography. The greenway route will also tie into the recently constructed pedestrian/cycle routes at St. Joseph's and Windmill Court residential developments, which have a combined length of approximately 800m. Figure 2 below shows the proposed greenway route.

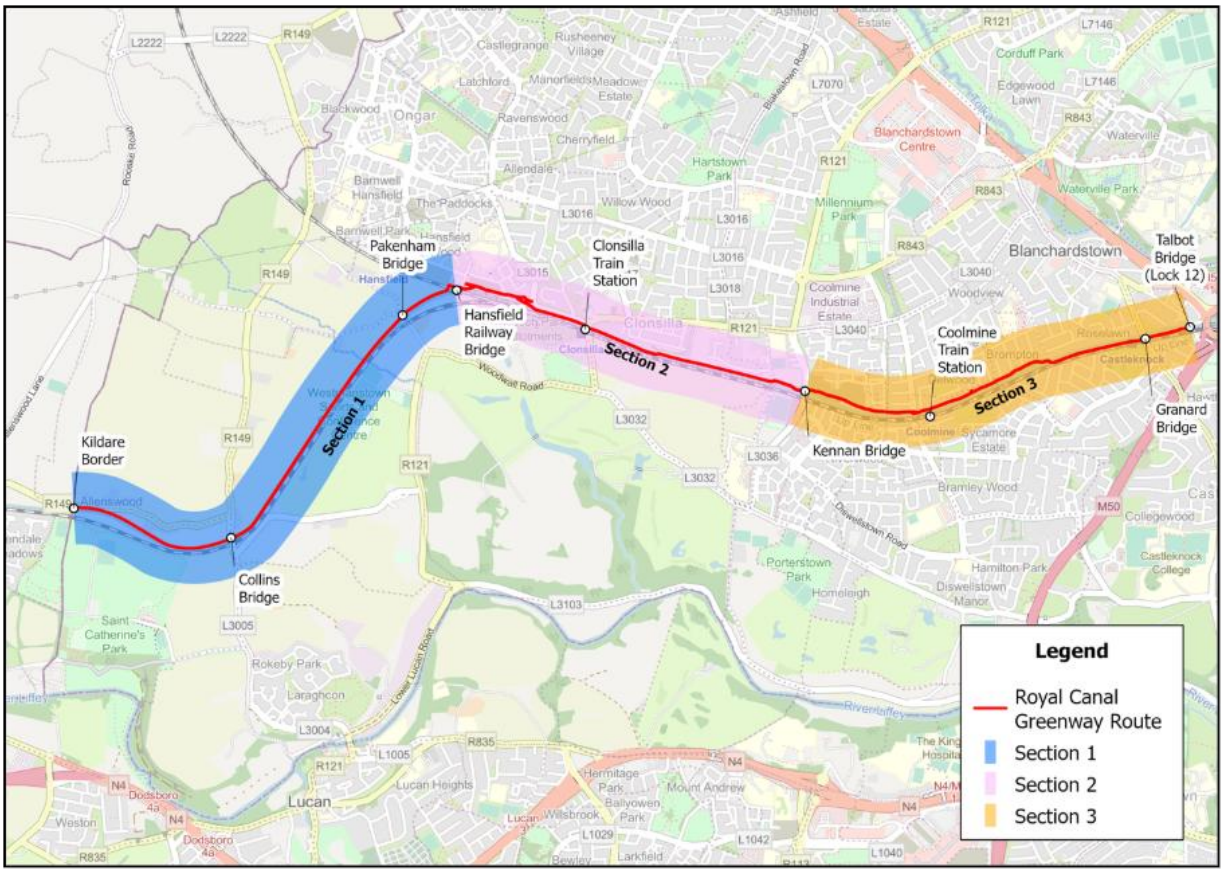


Figure 2: Proposed Greenway Route.

The proposed works include:

- Construction of the greenway route, including the following pavements and surfacing:
  - Section 1 – unbound surface (width 2-3m) from Kildare County Border (Confey Slipway) to Hansfield Railway Bridge (Ch. 0 – 3200m).
  - Section 2 – bituminous surface (3-4m width) for the majority of the section, with the exception of pre-cast concrete cantilevered boardwalk from approx. Ch. 4140 - 4540.
  - Section 3 - bituminous surface (4m width) for the majority of the section, in-situ concrete surfacing and portions of raised boardwalk due to local topography.
- Construction of embankments and retaining structures along certain sections of the route where the topography requires stabilisation.

- Provision of 3 no. toucan signalised crossings and 1 no. zebra crossing at road interfaces along the route.
- Lighting will not be provided on the western section of the Proposed Development. Lighting will be provided from Hansfield Railway Bridge to the 12th Lock, approximately Ch. 3200m to Ch. 8100m. The lighting design will be developed in accordance with relevant design standards and the environmental considerations assessed in the EIAR.
- To prevent the greenway overlooking the back gardens of the residents of Delwood Park and for security reasons, the ground level of the greenway is proposed to be lowered to match, or be lower than, the existing ground level of the adjacent back gardens and a 2m high timber palisade fence provided, with an anti-climb wire mesh fence (Ch. 6200 – 6800).
- Construction of the Quarry Bridge (30m single span composite steel beam and concrete deck bridge) which spans a steep section of historic quarry on the northern bank of the Royal Canal (Ch. +6500m).
- The 2m high fence line to be maintained along the southern side of the greenway along the Brompton green area. To provide further privacy to the Brompton residents, planting and railings will be provided on the Brompton side of the greenway through the Brompton green area.
- Construction of Landmark Bridge, a steel bridge which will traverse the canal at approximately Ch. 7115m to Ch. 7350m. The bridge will be approximately 235m in length and will have a maximum single span of approximately 30m.
- Construction of an underpass is proposed in Section 3 beneath Castleknock Road on the southern side of Granard Bridge (Ch. +7770).
- A Pocket Park is proposed at Hansfield, south of the St. Joseph's residential development. The park will have a wildflower meadow, native hedgerow, embankment slide, informal play area and benches etc.
- Removal of two existing residential properties and associated ancillary structures in the vicinity of Hansfield Road in order to facilitate the delivery of the greenway alignment and associated pocket park infrastructure.
- Landscape works, including the removal of selected trees, hedgerows and vegetation where required, and replacement planting using native and naturalised species as part of the Proposed Development's Landscape Plan.

Ecological surveys

Methodology

Desktop Baseline Study

A desktop study was conducted of available published and unpublished information, along with a review of data available on the National Parks and Wildlife Service (NPWS) and National Biodiversity Data Centre (NBDC) web-based databases, in order to identify key habitats and species (including legally protected and species of conservation concern) that may be present within ecologically relevant distances from the project as explained below. A baseline habitat assessment was performed using satellite imagery of the site. This open-source data (accessed September 2026) was consulted for the desktop study, and is listed below:

- The Status of EU Protected Habitats and Species in Ireland. Volume 1: Summary Overview (2025a).
- The Status of EU Protected Habitats and Species in Ireland. Volume 3: Species Assessment (2025b).
- Aerial photography available from www.osi.ie, Google Maps http://maps.google.com/
- Online data available on Natura 2000 sites as held by the National Parks and Wildlife Service (NPWS) from www.npws.ie
- Otter Survey of Ireland 2023-2024 – Irish Wildlife Manuals 161 (Reid et al. 2025)
- NBDC, 2026 – Species Distribution Maps; Available online at www.biodiversityireland.ie;

Field Surveys

Surveys for Otter *Lutra lutra* within the study area of the Proposed Scheme were conducted by Triturus Environmental Limited, with an initial report published in July 2022 (Triturus Environmental Ltd. 2022a). Walkover Otter surveys of the Royal Canal were undertaken on the 29th to 30th of November 2021 and on the 17th of January 2022. The survey area comprised the length of the Proposed Scheme. Whilst survey effort was focused on the canal and immediate riparian corridor, adjoining habitats with suitability for Otter were also surveyed, where present. The survey broadly followed the best practice survey methodology for Otter as recommended by Lenton et al. (1980), Chanin (2003) and Bailey & Rochford (2006). However, the methodology differed in that the entire waterline was surveyed rather than the standard 500-600m sections from accessible points (e.g. bridges). The novel survey technique, known as a Total Corridor Otter Survey (TCOS) (Macklin et al., 2019), encompassed the entire riparian zone along both banks of the Royal Canal and in-channel (boat-based) surveys.

The linear survey area was divided into 34 no. discrete 500m sections (17 along each canal bank) to facilitate greater resolution of data. Further information can be found in the Otter Report (Triturus Environmental Ltd, 2022b).

Additional Otter surveying was conducted by Triturus Environmental Ltd. in January-April 2023 (Triturus Environmental Lt, 2024), February 2024, January-April and November 2024, April of 2025 (Triturus Environmental Ltd. 2025), and in November – December 2026 (Triturus Environmental Ltd, 2026 – see Supporting Documentation included in application). The 2023, January-April and November 2024, and November – December 2025 surveys comprised approximately 33km of the Royal Canal between the 1st lock (Dublin City Centre) to the 16th

lock (Kilcock), while the February 2024 and April 2025 survey comprised of the 8.5km linear canal between the Kildare/Dublin border and the 12th Lock. Throughout all the Otter surveys, surveying followed the TCOS methodology. All surveys were also in line with the Guidelines for the Treatment of Otters Prior to the Construction of National Road Schemes (2006), and Ecological Surveying Techniques for Protected Flora and Fauna during the Planning of National Road Schemes (NRA, 2008).

Otter Signs

The annual survey area comprised of approximately 33km of contiguous canal between the 1st Lock at Spencer Dock (River Liffey confluence) and the 16th Lock at Kilcock, Co. Kildare. Otter sign surveys of the Royal Canal, using total corridor Otter survey (TCOS) methodology (see below), were undertaken in the November-December 2025 period. This period is considered optimal for surveys, given a greater propensity for Otter marking (pre-breeding) and a higher likelihood of sign detection due to decreased vegetation cover. The survey was completed during dry, mild, bright and settled conditions, which ensured that a good representation of habitat marked by otter could be recorded in the field, including territorial marking or marking of feeding and potential breeding areas.

Each other sign was logged by type, location (handheld GPS), condition and approximate age for later interpretation to distinguish differences in habitat use and activity. Spraints were subjectively assessed as either very fresh, fresh, mixed-age (recent and older spraints, typically indicative of a regular sprainting site) or old (spraint not recently deposited or degrading). Furthermore, indicative counts of spraint (i.e. number of individual spraints) and the number of sprainting sites (often clusters in one area) were noted. This helped indicate the frequency of otter marking, which can clarify levels of activity in particular areas, inclusive of breeding (holt) and resting (couch) areas.

Total Corridor Otter Survey (TCOS) Methodology

The survey broadly followed the best practice ‘standard survey’ methodology for Otter as recommended by Bailey & Rochford (2006), Chanin (2003) and Lenton et al. (1980) (all based on observations by Erlinge, 1967). However, methodology differed in that the entire waterline was surveyed rather than the standard 500-600m sections selected at regular (5-8km) intervals from accessible points (e.g. bridges). The novel survey technique, known as a total corridor Otter survey (TCOS) (Macklin et al., 2019), involved a continuous, unbiased survey effort along both banks of the Royal Canal, encompassing the entire channel and riparian zones. A boat or kayak facilitated the survey of areas of channel or bank with poor access.

Total corridor survey methodology typically involves the use of two (or more) surveyors working independently (in tandem) along each respective bank of an individual watercourse (where practical). This also facilitates one to work from a more elevated position (e.g. bank top) with one surveying (with appropriate PPE such as a dry suit or chest waders) from within the channel/watercraft. This holistic, labour-intensive approach greatly increases the likelihood of otter sign detection and facilitates a more accurate estimation of otter usage and activity at the river or catchment scale. This is especially true of more cryptic signs, such as holts and couches that are often located in poorly accessible areas not covered by a standard survey approach.

Results

Desktop Study

The number of Otter records within the Royal Canal from resources like the NBDC and NPWS are low and many Otter records along the Royal Canal are anecdotal. It has previously been noted that Otter activity along the Royal Canal is much less evident than in neighbouring River Tolka or River Liffey (Keeley, 2004).

However, targeted Otter surveys completed by Triturus along various sections of the Royal Canal in recent years (2019-2024) have revealed a significant number of Otter signs, inclusive of legally breeding and resting areas. For example, a total of 39 no. signs, including spraint sites, slides, couches and a number of potential holts were recorded along the Royal Canal corridor between the M50 (12th lock, Castleknock) and the River Liffey confluence (Spencer Dock) in January 2022 (Triturus, 2022).

Previous annual Otter surveys completed by Triturus in January to April 2023 and January to April and November 2024 recorded a total of 54 and 59 Otter signs, respectively, within the 33km survey area (Triturus, 2024a; Triturus, 2024b). These surveys also recorded a low number of holts and couches.

Otter utilisation of the canal is widespread between Spencer Dock (River Liffey confluence) and Kilcock, Co. Kildare, although several areas repeatedly feature a greater concentration of Otter marking (e.g. near Maynooth & 7th lock to Kennan Bridge) and are more valuable as breeding and resting areas. Many marking and breeding/resting sites along the Royal Canal are used inter-annually, as evidenced by previous surveys (per observation).

NBDC records for the Proposed Scheme and surrounding area (collected in September 2026) are presented in Figure 4 and Table 2. These correspond to all available NBDC data, irrespective of age of records.

Survey Results

During the initial surveys between 2021-2022, two holts were identified adjacent to the proposed greenway route, both of which showed no signs of activity during camera trap monitoring. A total of 14 Otter signs were recorded within the survey area, including spraints, prints, and holts.

The surveys undertaken throughout January-April 2023 from the 1st lock to the 16th lock a total of n=54 Otter signs were recorded. Spraint sites accounted for 36 of the signs recorded. A total of 8 holts were encountered along the 33km stretch of the canal: 5 couches, 2 slides, 2 latrines and one deposit of anal jelly. Of these findings, the stretch of the canal for the greenway's works, a total of n=11 Otter signs were encountered, including n=7 spraint sites and n=4 holts, which remains similar to that of the result of the previous surveying in 2022. When this 33km stretch of the Royal Canal was resurveyed between January-April 2024 and in November 2024. A total of 28 spraints, 5 holts, 5 couches, 15 latrines, 5 slides and 1 record of anal jelly were found on the Royal Canal between the 1st and 16th Lock, with 8 spraint sites, 1 holt site and 1 couch site recorded in the area of the Proposed Scheme.

In April 2025, Triturus surveyed just the 8.5km linear area between the county boundary and the 12th Lock. That year, there were 8 spraint sites, 1 holt, 2 latrines found within the area of

the Greenway route (Triturus Environmental Ltd. 2025). Of the holts identified within 30m of the Proposed Scheme, 1 breeding holt was identified to the west of the Proposed Scheme, while an additional 3 inactive holts were identified within a woodland area to the east of Coolmine Bridge. Triturus conducted additional surveys along the 33km stretch of the canal previously surveyed in 2023 and 2024 during the November – December 2025 period (Triturus Environmental Ltd, 2026). A total of 63 otter signs were recorded within the survey area, including 39 spraints, 9 latrines, 5 holts, 5 couches, 5 slides, and 1 anal jelly site. This was an increase from the previous surveys in 2023 and 2024. Along the Proposed Scheme, 8 spraints, 1 latrine, and 1 holt were identified. No new holts were identified during these surveys, with the holt identified adjacent to the Proposed Scheme having been identified during the previous Triturus surveys.

While 4 holts were identified along the Proposed Scheme, only 1 was identified as being active, with the 3 holts identified within a woodland area to the east of Coolmine Bridge identified as being inactive. No evidence of activity was identified within these holts across the entire survey period (2022-2026), and as such these holts have been determined to be historical (Triturus Environmental Ltd, 2026). The breeding holt recorded is shown below in Figure 3.

Table 1: Summary of the Otter signs recorded in the Royal Canal survey area (33km extent), November-December 2025 compared to previous years (Triturus Environmental Ltd, 2026)

	Total no. signs		
Otter Signs	**2025**	**2024**	**2023**
Spraint site	39	28	36
Latrine	9	15	2
Holt	5	5	8
Couch	5	5	5
Slide	5	5	2
Anal Jelly	1	1	1
Total	**63**	**59**	**54**

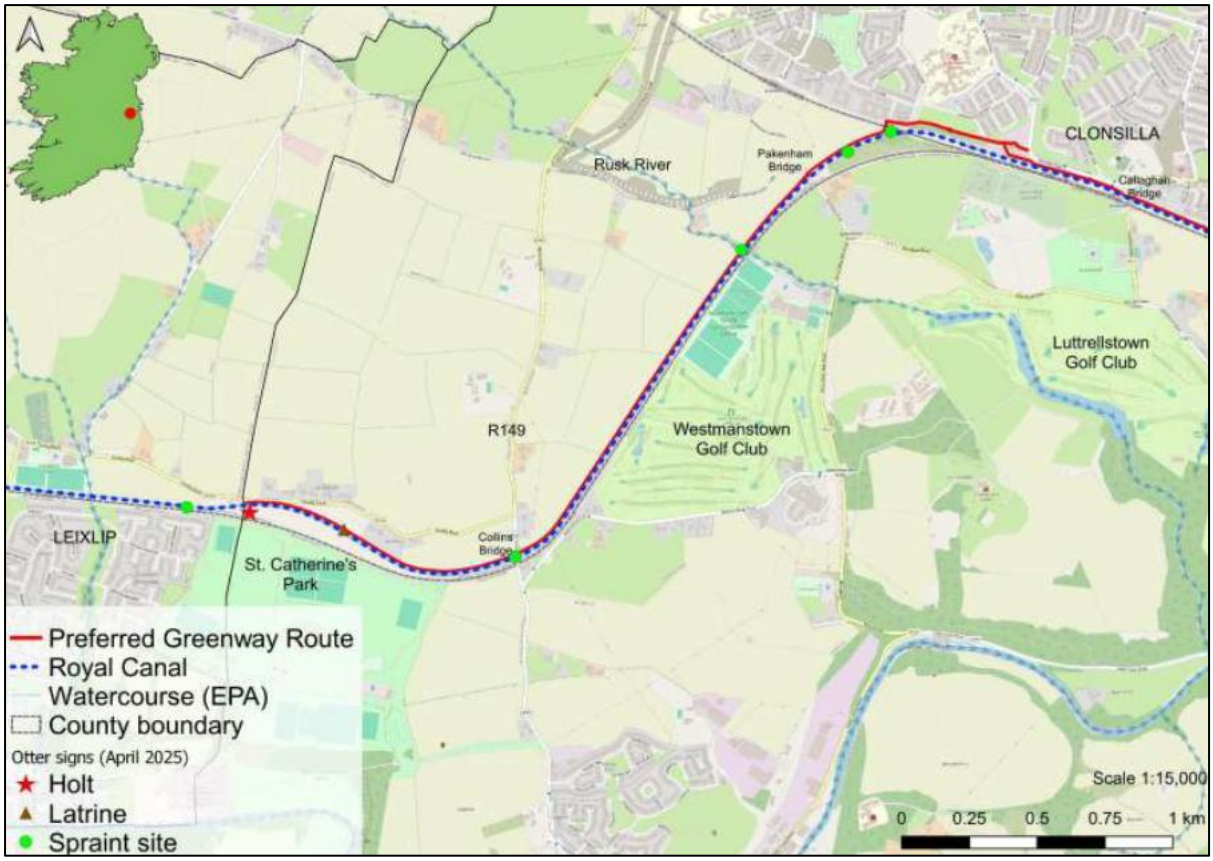


Figure 3: Location of recorded Otter breeding holt in respect to the Proposed Scheme at the Kildare/Dublin County border.

Table 2: NBDC Otter records in the vicinity of the Proposed Scheme (NBDS, 2026).

Record Id	Grid	Site	Dataset	Precision	Recorder	Date	Abundance	Record comment
153086842	O008357	River Liffey at Leixlip/N4	Otter Survey of Ireland 1982	100m	L.L. Chapman; P.J. Chapman	04/05/1980	5 Count of Droppings	Site No: O SW 19 / Type of Habitat: Running Water
153086858	O050382	Royal Canal near Beech Park House	Otter Survey of Ireland 1982	100m	L.L. Chapman; P.J. Chapman	03/05/1980	1 Count of Droppings	Site No: O SW 17 / Type of Habitat: Canal
142029554	O054379	Royan Canal, Clonsilla	Mammals of Ireland 2016-2025	100m	Aidan Keegan	15/05/2016	1	Sighting of live animal
146317345	O076374	Strawberry Beds, Lucan	Atlas of Mammals in Ireland 2010-2015	100m	Owen Mulholland	20/08/2014	1	Sighting of live animal
142025728	O082390	Blanchardstown	Mammals of Ireland 2016-2025	100m	Sandra Convery	06/12/2018		Sighting of live animal
153086859	O092383	Tolka River at Blanchardstown	Otter Survey of Ireland 1982	100m	L.L. Chapman; P.J. Chapman	03/05/1980	1 Count of Droppings	Site No: O SW 16 / Type of Habitat: Running Water
142676836	O083357	Liffey Valley Park, Co. Dublin	Ireland's BioBlitz	100m	Daniel Buckley	20/05/2011		
153086839	O088357	River Liffey at Palmerstown	Otter Survey of Ireland 1982	100m	L.L. Chapman; P.J. Chapman	04/05/1980	1 Count of Droppings	Site No: O SW 18 / Type of Habitat: Running Water

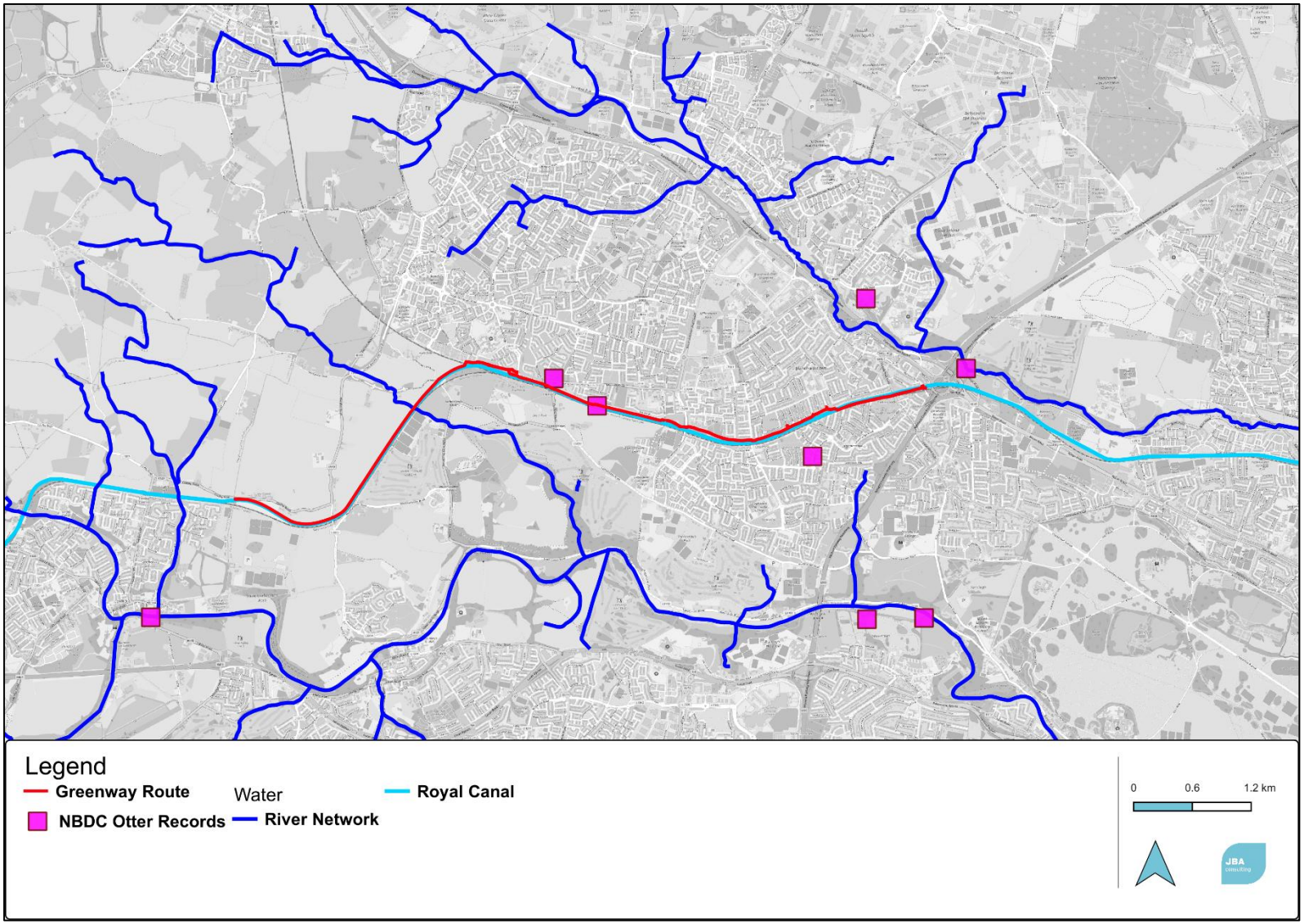


Figure 4: NBDC records centred around the Proposed Scheme

Status of the species in the local/regional area

The 2023-2024 national Otter survey indicates that Otter is widespread, with a stable population and that Ireland remains a stronghold for the species. The Overall Status assessment remains Favourable, and the stable trend is a change from the improving trend recorded in 2019 (NPWS 2025b, 2025a). Following corrections for survey bias, the 2023-24 Otter population was estimated at 6,635 adult females [95% 6,050 – 7,171] (Reid et al. 2025). The current population is considered to be within 5% of Favourable Reference Population.

The number of Otter records within the Royal Canal from resources like the NBDC and NPWS are low and many Otter records along the Royal Canal are anecdotal. It has previously been noted that Otter activity along the Royal Canal is much less evident than in neighbouring River Tolka or River Liffey (Keeley, 2004). Nevertheless, targeted Otter surveys in recent years (2019-2024) have revealed a significant number of Otter signs including spraint sites, slides, couches and a number of potential holts along the Royal Canal. Otter utilisation of the canal is widespread between Spencer Dock and Kilcock, Co. Kildare, although several areas repeatedly feature a greater concentration of Otter Marking and are more valuable as breeding and resting areas.

NBDC records indicate that Otter have been recorded in the area for over 40 years. Whilst no population estimates are available for the Liffey and Dublin Bay catchment, Otter hold a territory on the Royal Canal, and evidence of breeding through the presence of a breeding sites in the area is also recorded. The historic records and the more recent years of documented Otter in the area would suggest that breeding and successful rearing of young occurs.

Population size class assessment.

Otter are solitary mammals, with males and females living apart except in times of mating; Female Otter raise their cubs and feed them for about 1 year, with no male Otter input. Male territories may be vast, with female territories much smaller and often using core areas. Some overlap between female territories may occur.

Within the Otter surveys on the Royal Canal between Kilcock and 1st Lock at Spencer dock (2022-2026), five Otter holts were recorded. Four of the holts were identified as inactive historic holts with no activity recorded throughout the surveys. One active breeding site was recorded adjacent to the westernmost extent of the Proposed Scheme boundary. Additionally, several signs of Otter utilisation were recorded throughout the Royal Canal in the form of spraint sites, latrines and couches.

Additionally, two inactive badger sett entrances were recorded within the woodland habitat between Coolmine Bridge and Roselawn Avenue (Ch +6300 -7170) which are located within 30m of the proposed works in close proximity to the canal. Due to their proximity to the canal, there is the potential for cross-species use of these setts by local Otter.

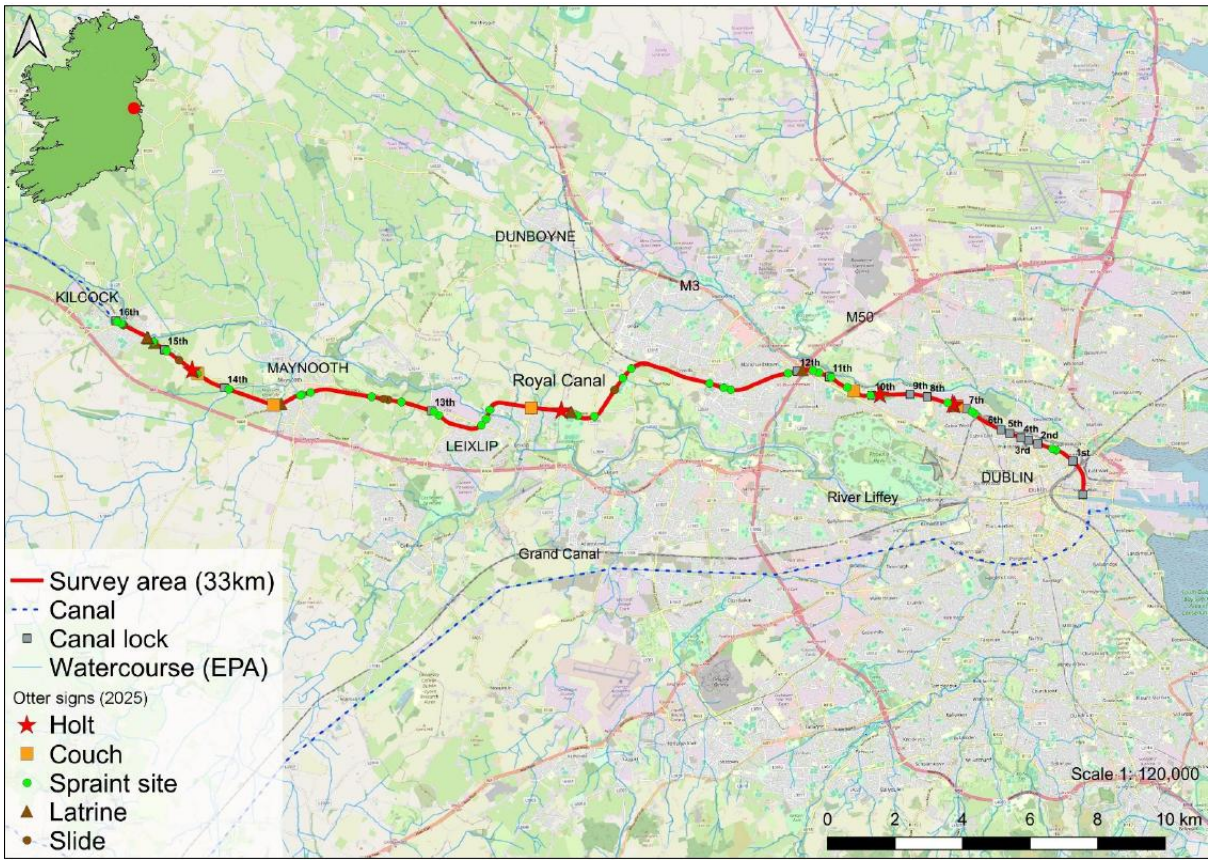


Figure 5: Overview of the Otter signs recorded in the Royal Canal survey area, November-December 2025 (Triturus, 2026)

Evidence to support derogation

Test 1 - Reason for derogation

The need for the proposed Royal Canal Urban Greenway is firmly established by a broad range of national, regional and local policy objectives relating to sustainable mobility, compact growth, climate action, recreation, tourism, public health and quality of life. The scheme represents a strategically important piece of active travel infrastructure that will make a significant contribution to the delivery of these objectives by providing a high-quality, safe, attractive and environmentally sensitive pedestrian and cycle route based on an integrated and sustainable transport network that is inclusive and accessible to all users.

The Proposed Development will deliver a major new amenity for local residents and for communities across Dublin 15, the wider Dublin Metropolitan Area and east Kildare, enhancing quality of life, promoting healthy and active lifestyles, facilitating sustainable travel choices and supporting social inclusion. The Greenway will strengthen connectivity between existing and planned residential areas, employment centres, schools, public transport services and recreational destinations, providing a viable alternative to private car use and helping to reduce transport-related emissions.

The need for the development is further reinforced by its role in implementing the objectives of the National Planning Framework, National Sustainable Mobility Policy, Climate Action Plan, Transport Strategy for the Greater Dublin Area, the Strategy for the Future Development of National and Regional Greenways and the Fingal Development Plan 2023–2029.

As part of the wider Royal Canal Greenway and National Cycle Network, the scheme will also enhance access to the Royal Canal corridor as a significant recreational, environmental and heritage asset, while acting as a tourism attractor with associated economic benefits for the area. The Proposed Greenway therefore represents essential strategic infrastructure that will support the sustainable growth and long-term resilience of the Dublin Metropolitan Area while delivering substantial environmental, social and economic benefits.

Approximately 134km of the Royal Canal Greenway has now been completed – stretching from Leixlip in Kildare to Cloondara in Co. Longford. To the east, a 4km section from Ashtown to Phibsborough is completed. The Proposed Scheme of 8.1km will provide the missing link between the urban and rural sections of the Greenway already completed.

The key objectives of the Proposed Scheme are as follows:

- To deliver a high-quality, safe and accessible active travel corridor comprising a shared walking and cycling route that meets existing and future commuter and recreational demand.
- To transform the Royal Canal corridor into an attractive and welcoming public space, enhancing local amenity, recreation and quality of life, including the provision of a pocket park at Hansfield.
- To improve connectivity and permeability between communities, key destinations and public transport infrastructure, including rail stations, DART+ West and the wider regional active travel network.

- To promote walking and cycling as attractive, viable and sustainable transport choices, supporting healthier lifestyles, reducing reliance on private cars and contributing to reduced traffic congestion.
- To support tourism, local economic activity and community wellbeing through the provision of a high-quality Greenway and active travel facility.
- To protect and enhance the environmental, ecological, heritage and landscape value of the Royal Canal corridor, while respecting existing uses and operational requirements.
- To ensure the Greenway is planned, designed and delivered in accordance with relevant national guidance, statutory requirements and stakeholder objectives, including the implementation of appropriate mitigation measures identified through environmental assessment.

The need for the Proposed Development is further reinforced by the significant population growth that has occurred and is planned within the Royal Canal corridor and wider Dublin 15 area. A review of planning activity undertaken as part of this report identified 1,838 residential units granted planning permission within 500m of the route since 2020, in addition to substantial planned growth associated with the Hansfield SDZ, Barnhill Local Area Plan and Kellystown Local Area Plan areas The continued delivery of housing and population growth in these locations requires the parallel provision of high-quality active travel, recreation and green infrastructure in order to support sustainable communities, enhance accessibility and reduce reliance on private car travel. In this regard, the Proposed Development represents essential strategic infrastructure which will provide sustainable connectivity between existing and emerging communities, schools, employment locations, local services, public transport facilities and recreational amenities throughout the corridor.

There is a clear, compelling rationale for development of the Proposed Greenway along the Royal Canal. As demonstrated in Section 5 Policy – there is widespread support across a broad range of national, regional and local policy for quality Greenway transport corridors with recognition of the benefits for sustainable mobility, transport and accessibility, contribution to the climate agenda, economic benefits including for tourism, and as quality-of-life enablers, recreational and amenity assets.

Test 2 - Absence of alternative solutions

Do-Nothing

The ‘do nothing’ scenario for the Proposed Scheme is that pedestrians and cyclists will continue to walk and cycle along the existing narrow and substantially unsurfaced towpath. The towpath along the ‘Deep Sinking’ section is very dangerous at present. This section typically consists of a 2-3m wide track, with local pinch points of approx. 1.3m, flanked by a deep cutting of 1.0-9.0m to the canal.

Also, tree roots cross the towpath at a number of locations, creating trip hazards.

Accessibility to the greenway on the southern embankment is restricted between Kennan Bridge (Porterstown Road) and Kirkpatrick Bridge (Coolmine Road) (approx. 900m) and between Kirkpatrick Bridge (Coolmine Road) and Granard Bridge (Castleknock Road) (approx. 1.5km) due to the railway line on the southern side of the towpath, thereby preventing permeability and linkages from residential catchments, resulting in less passive surveillance and security for users.

The existing towpath results in an environment that is not safe, not comfortable and not attractive for pedestrians and cyclists. The latent commuter and recreational user demand will continue to be supressed by the existing poor walking and cycling environment along the towpath (particularly within the ‘Deep Sinking’ section.

In the context of human health, the benefits of walking and cycling are well documented and include improved cardiovascular fitness, chronic disease prevention, improved mental health wellbeing, strengthened immune system and a reduced risk of cancer, obesity and coronary heart disease. These benefits will not be realised in the ‘do nothing’ scenario.

If the proposed greenway is not constructed, the additional economic benefit which could be derived from the project will not be realised. This benefit can be estimated in basic terms by reference to the Department of Public Expenditure and Reforms ‘Public Capital programme 2021 – 2030: Labour Intensity of Public Investment’. The paper estimates that for a €1 million increase in construction expenditure, direct and indirect employment will increase by approximately 8 job years. The analysis, also have estimated, that on average, approximately 80,742 construction jobs will be sustained per year as a result of public investment over the period of 2021 and 2030.

In the ‘do nothing’ scenario, the long-standing objectives of the Fingal County Development Plan to deliver the proposed development will not be realised.

Based on the reasons outlined above, the ‘do nothing’ scenario will essentially result in a lost opportunity, and it would leave a section of the strategic Dublin–Galway cycle corridor (266 km) incomplete.

Alternatives Considered

As part of the EIAR, a number of route alternative routes were considered for the Proposed Scheme. The Proposed Scheme was developed iteratively by feedback and new information gathered throughout each stage of public consultation, as well as by data collected and assessed during the process, including ground investigations, independent expert peer review (undertaken by GDG Consultants), and environmental studies.

The development of the Proposed Scheme evolved in the following stages:

1) A **Feasibility Report**, prepared by Atkins on behalf of FCC, which was published in 2012, was a high-level feasibility and constraints study. It examined the overall engineering feasibility of upgrading the existing towpath along the Royal Canal from the 12th lock to the Kildare Boundary. It examined the overall engineering feasibility of upgrading the existing towpath along the Royal Canal from the 12th lock to the Kildare Boundary. The scope of this study was to establish the constraints and developed a working knowledge of the issues along the proposed route. The report highlights significant constructability constraints along the deep sinking area, however, assessing whether these constraints could be overcome was outside the scope of this study
2) Development of a **Draft Emerging Preferred Route** (2018 - 2019). Informed by stakeholder and community engagement and the availability of additional design information such as Topographical Surveys, Tree Survey and Ecological Surveys (such as habitat surveys, breeding waterbird surveys and survey of terrestrial molluscs).
3) A first round of non-statutory **Public Consultation** was undertaken on the **Emerging Preferred Route** from 25th February 2019 to 27th March 2019;
4) Development of **Preferred Route Option** (April 2019 to May 2021). Informed by feedback from the first round of public consultation, consultation with An Garda Siochána, stakeholders and community engagement and the availability of additional design information such as, additional topographical surveys, ground investigation (GI) surveys, independent expert peer review (undertaken by GDG consultants), the design of the Emerging Preferred Route evolved with further alternatives considered;
5) A second round of non-statutory **Public Consultation** was undertaken on the **Preferred Route Option** from 25th May 2021 to 7th July 2021.
6) Finalisation of **Preferred Route Option**. Drawing on feedback from the public consultation process, continued stakeholder engagement, and new design information, including additional surveys at Hansfield and along the route (tree surveys, and ecological surveys for otter, badger, bat, breeding birds, updated grassland assessments, and pollinator activity), the preferred route option, along with the necessary mitigation measures, is now being finalised.

In respect of the identified Otter breeding holt located in close proximity to the Dublin/Kildare County border along the Royal Canal, there was minimal scope for alternatives at this location due to the narrow nature of existing towpath adjacent to the Canal. However, given the proposed works will take place on the opposite bank to the Royal Canal, potential disturbance will be limited to visual and audible sources.

The Proposed Scheme will improve sustainable transport choices for school children and commuters within Dublin City and contribute to delivering key elements of Fingal Development Plan 2023-2029 including the key strategic objective of ‘inclusiveness and a high-quality of life for all, through healthy placemaking and social justice. An integrated approach will align housing and public transport provision’. Not going ahead with the Proposed Scheme would negate these objectives.

Test 3 - Impact of a derogation on conservation status

Evaluation of the effects of the works on Otter conservation status

Otter surveys carried out on a national level show that Ireland continues to remain a stronghold for Otter. The latest survey carried out in 2023-2024 indicated that the species is widespread with an overall stable population, with the status remaining favourable. Within 200m of the red line boundary of the Proposed Scheme, one breeding holt was recorded and was determined as active. Three historic holts, east of Coolmine Bridge, and one west of the Scheme area, were determined as inactive, with no evidence of activity identified within these holts throughout the entire 2022-2026 survey period. However, evidence for the utilisation of the Scheme area by local Otter was recorded within the 2025 survey period, with the presence of spraint sites and latrines.

Within the Proposed Scheme boundary, no known active holts will be destroyed or damaged.

A suite of mitigation measures will be implemented to minimise and mitigate any potential disturbance caused by the works to the adjacent breeding site and for Otter utilising the site.

Ecological Clerk of Works (ECoW)

Fingal County Council as the Contracting Authority is responsible for the delivery of the Royal Canal Greenway and will appoint an Ecological Clerk of Works (ECoW) for each of the pre-work monitoring, construction and post construction monitoring phases of the Proposed Scheme. The ECoW appointed to the works will be responsible for implementing the mitigations outlined in the EIAR as part of the planning application. Additionally, as part of the construction program, a section of the Proposed Scheme specifically an area between Coolmine Bridge and Roselawn Avenue (chainages +6200 +7200), will be constructed concurrently to the rest of the Proposed Scheme. An additional ECoW will be appointed to oversee this section of works, which is outlined within the EIAR.

General Mitigation Measures

Given the presence of the active breeding holt, mitigation measures are included within the EIAR to ensure there are no adverse impacts to the holt. These measures also address potential impacts to the historical holts alongside impacts to habitats and disturbance to Otter.

In respect to general mitigations to safeguard the wellbeing of local Otters and their foraging resources, there will be strict adherence by the appointed contractor, as overseen by the ECoW(s), to the mitigation measures outlined in the Construction Environment Management Plan (CEMP) that will be submitted alongside the EIAR for planning, which pertains to best practice guidance and the protection of surface water, groundwater and air quality.

Additionally, standard mammal mitigation measures will be adhered to, including the covering of all excavations to prevent accidental trapping, and the provision of mammal escape ramps in larger excavations. Where works are located adjacent to the watercourse, appropriately designed exclusion fencing will be installed to prevent Otter access to potentially hazardous areas of the site, therefore reducing the risk of injury or entrapment. The fencing will be securely fixed to the ground, of sufficient height, and designed to prevent Otter's from passing underneath or through it. Such fencing will be regularly inspected and maintained to ensure its effectiveness.

The specific Otter mitigation measures within the EIAR will be implemented to ensure that the Otter population present within the Royal Canal are not subjected to any adverse impacts. This includes a requirement for a pre-construction survey for Otter activity along the proposed route, including camera

trapping of the active and inactive holts and couches along the Proposed Scheme. These will be repeated annually for the duration of the construction phase. Additionally, the camera trapping of the three historic Otter holts identified along the route will be conducted throughout the eight weeks leading up to the commencement of pre-enabling works. All data from these pre-enabling surveys will be provided to the appointed ECoW(s), who will be briefed in detail by the Otter survey team, and will flag whether inactive holts have switched from inactive to active or from non-breeding to breeding status and vice versa. Females with cubs younger than six months old may find it difficult to reunite if separated by disturbance. Resting places used by females with cubs aged up to six months should therefore be considered as breeding sites (Findlay & White, 2026).

If the identified breeding holt, located on the opposite bank at westernmost section of the works, is identified to be active with the female and her cubs (younger than six months) in the eight weeks leading up to the commencement of construction works, then works will be postponed for as long as reasonably possible, i.e., other time sensitive ecological / construction periods etc., within 150m of the breeding holt. Once camera monitoring of the holt and expert analysis of the offspring size / length has determined the cubs to older than six months, i.e., less vulnerable to disturbance and separation from the adult female, then works can proceed with standard Otter mitigations in place. If there is imperative need to proceed with works prior to this cub maturation milestone, then an ECoW will oversee the manual / by-hand construction of timber hoarding along the canal length present within 150m disturbance buffer. Vehicular use is to be limited to supply of material only, as continuous vehicle disturbance prior to full mitigating effect of the full-screen wooden hoardings will introduce unnecessary levels of disturbance.

Additionally, to mitigate for the disturbance to the identified breeding holt, outside of the sensitive six month breeding / natal period, an artificial above-ground Otter holt is to be constructed a minimum of 50m upstream / west of the works area to provide suitable substitute refuge for the local female, her offspring (older than six months) and male Otter, while the breeding holt is within the disturbance buffers of the construction works. This gives the local male, female and offspring and additional refuge option away from all active works throughout the construction phase. Figure 6 below highlights a suitable location of mixed woodland, scrub, reedbed and dry meadow habitats, for the installation of the artificial holt upstream of the works. The artificial holt will be comprised of natural materials with minimal impact on the surrounding flora and soil structure. This short-term provision of substitute refuge will ensure that there is no loss of potential refuge within the immediate locality of the breeding holt during the works. This artificial holt will be installed during the initial stage of the enabling works, with the holt being in place for at least six months prior to commencement of works along the canal at this westernmost location. The six-month prior installation is important to ensure familiarisation with the structure, otherwise the local male and female Otter may be affected by neophobia, which may prevent them from taking up residence within the holt during the construction period, resulting in disturbance mitigation failure.

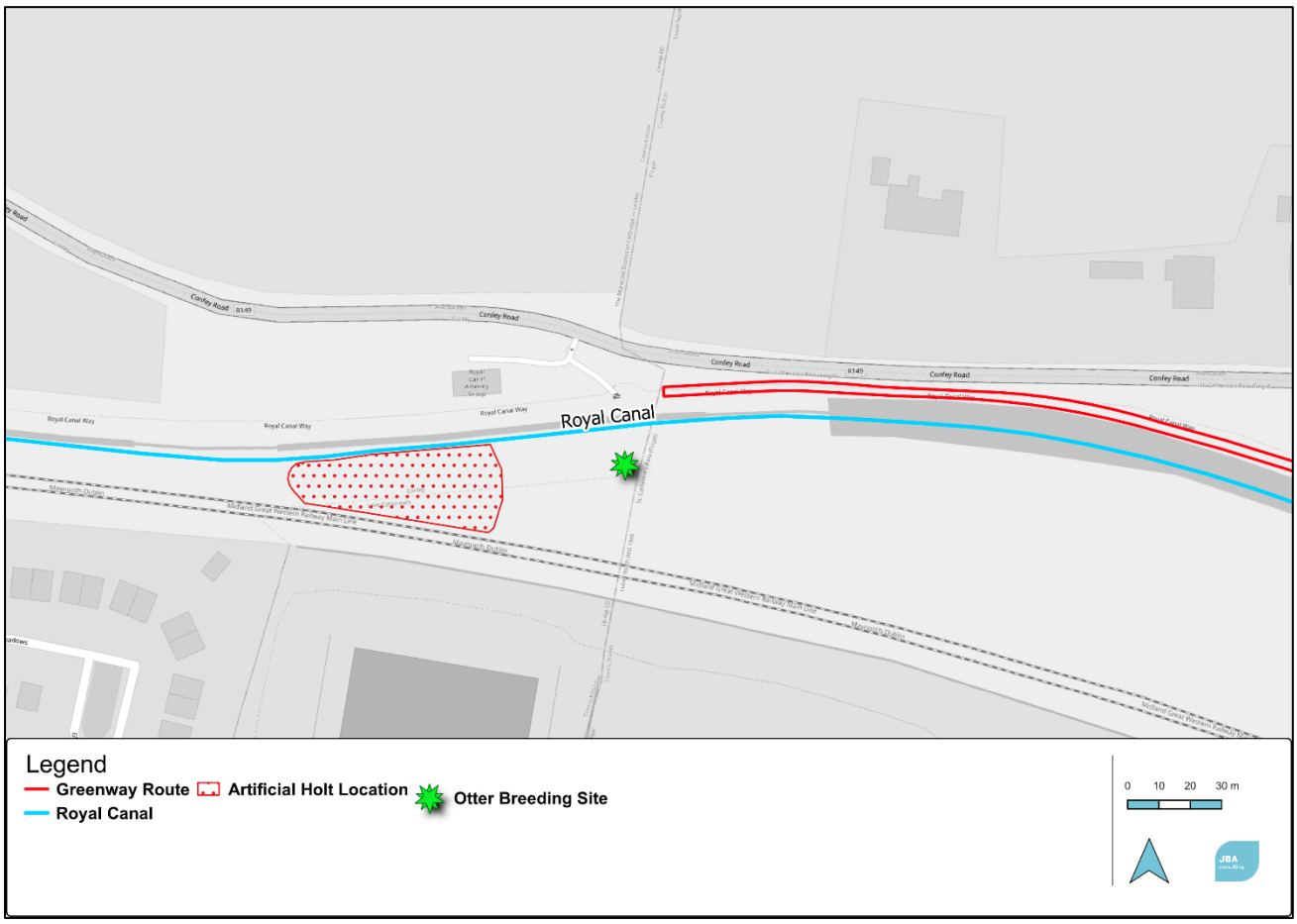


Figure 6: Suitable location for artificial Otter holt located over 50m upstream of the proposed works.

The following measures have been outlined within the EIAR to address the treatment of active Otter holts and are adapted from the NRA guidance (2006) for the treatment of active Otter holts. These are outlined below:

- Whilst the use of one-way gates is normally a procedure adopted in relation to the exclusion of Badgers from setts, and not a standard procedure for the exclusion of Otters from holts, this method may be used, in some circumstances, with gates being left in place for a period of 21 days as advised in relation to Badgers.

In regard to the inactive Badger setts that may be used by Otter within the Proposed Scheme, resurveying of both setts will be carried out prior to the commencement of works. If the setts are recorded as inactive, they will be temporarily blocked following the Guidelines for the Treatment of Badgers Prior to the Construction of National Road Schemes (NRA, 2005). This will prevent potential temporary occupation by any faunal species, including Otter, during the construction works in the immediate vicinity of these setts.

Proposed Mitigation Measures for Noise and Vibration

Construction works have the potential to impact the connectivity of the wildlife corridor that is the Royal Canal. This wildlife corridor exists as a series of linked areas of habitat offering variability in foraging and refuge opportunities for a variety of species occurring along the Royal Canal, including Otter that would utilise the waters of the canal for commuting. The measures for the prevention of disturbance on species through noise, light and habitat disconnection include:

- The use of machinery for lifting bulky items, dropping, and loading of materials within work areas will be restricted to normal working hours.
- For mobile plant items such as dump trucks, excavators and loaders, the installation of an acoustic exhaust and or maintaining enclosure panels closed during operation can reduce noise levels by up to 10dB. Mobile plant will be switched off when not in use and not left idling.
- For compressors, generators, and pumps, these can be surrounded by acoustic lagging or enclosed within acoustic enclosures providing air ventilation.
- All items of plant will be subject to regular maintenance. Such maintenance can prevent unnecessary increases in plant noise and can serve to prolong the effectiveness of noise control measures.
- Care will be taken when cleaning augers of piling rigs. Shaking and banging of the auger to loosen earth will be avoided.
- Use of pneumatic hand tools will be avoided at night-time, and fixings will be manually tightened.
- Prior to construction, a survey will be carried out along the Royal Canal within the 150m disturbance buffer to check for signs of Otter to ensure no breeding holts are disturbed. This survey, and any subsequent follow ups shall follow the most up to date guidelines and / or methods described in The Otter Field Survey & Monitoring Handbook.
- A specialist sub-contractor shall also be engaged by the main contractor to monitor, collate and report on noise and vibration results for the duration of critical work activities, as part of a Noise and Vibration Management Plan (NVMP).

To reduce the opportunity for light pollution across the area of proposed work, works will be limited to daylight hours whenever possible. If works are required to take place at night, lights with the shortest column height will be used. These lights will be LEDs, oriented in a manner and highly cowled with hoarding around the proposed areas of works erected so that any light spill is reduced to levels no higher than a lux level of five.

Surface Water Mitigations

An Outline Construction Environmental Management Plan (OCEMP) accompanies the EIAR outlining the measures to be implemented during construction to protect aquatic dependent habitats and species on site. The CEMP once finalised by the contractor, will be provided to FCC and the Waterways Ireland Environmental Team prior to the commencement of any works. Construction will only go ahead once the CEMP has been deemed acceptable by WI and the Fingal Biodiversity Officer.

In addition to the CEMP, routine practice and procedures to prevent pollution of the environment will apply. These include:

- Silt fences and grassed swales/catchment ditches will be constructed around the perimeter of work areas, compounds, storage yards, stockpile areas and along and the adjacent to the banks of the canal and any drainage ditches in order to prevent the infiltration of adjacent habitats by water run off that could be contaminated by silt, dust or pollutants. The silt fencing will follow the additional guidance:
    - Due to the length of the Proposed Scheme, silt fencing will only be installed along the bank of the canal and any drainage ditches immediately adjacent to the works. Fencing will cover the immediate work areas, which is defined in the construction program as sections of the existing public greenway which will be incrementally closed.
    - Silt fencing will also be installed within the Delwood work areas (Chainage +6500 to +7350), covering a 50m buffer from the immediate works area. The silt fencing will be erected on the canal side of the works and will be installed at the nearest possible distance to the works, i.e. a suitable buffer distance that enables construction vehicles to work without colliding with the fencing.
    - Works will only take place once the silt fencing has been erected and checked by one of the onsite ECoWs. Silt fencing will also only be taken down from sections adjacent to completed work sites following permission from the onsite ECoW.
- If sustained heavy rainfall (> 10mm) occurs during the stripping of topsoil and excavations, work must be suspended and not restarted until the ground has had at least a full dry day (DEFRA, 2009) with the objective of minimizing soil erosion;
- All material including oils, solvents and paints will be stored within temporary bunded areas or dedicated bunded containers within the designed site compounds;
- Refuelling will take place in the designated site compounds away from surface water gullies, drains and water bodies, and in the event of refuelling outside of this area, fuel will be transported in a mobile double skinned tank;
- All machinery and plant used will be regularly maintained and serviced and will comply with appropriate standards to ensure that leakage of diesel, oil and lubricants is prevented;
- The contractor will ensure compliance with environmental quality standards specified in the relevant legislation, namely European Communities (Environmental Objectives (Surface Waters)) Regulations, 2009 (S.I. No. 272 of 2009 and amendments);
- Oil booms and oil soakage pads will be maintained on-site to enable a rapid and effective response to any accidental spillage or discharge. These shall be disposed of correctly and records will be maintained by the environmental manager of the used booms and pads taken off site for disposal;

- Management of silt-laden water on-site, including procedures for accidental leaks / spills to ground, as well as water quality monitoring to ensure compliance with environmental quality standards specified above;
- At no point during the construction phase will treated-water be discharged to local surface water network without the water quality meeting the statutory limits as set under the environmental quality standards specified above;
- Fail-safe site drainage and bunding through drip trays on plant and machinery will be provided to prevent discharge of chemical spillage from the sites to surface water;
- To prevent the spread of any accidental discharge into the surface water network, oil booms will be on hand when construction activities are located beside aquatic habitats in order to control and minimise the spread of the spill;
- Washout of concrete plant will occur at a designated impermeable area with waste control facilities;
- As detailed within the Construction Methodology, the steel superstructure for the Landmark Bridge will be fabricated off site and brought to site on a special vehicle and then craned into position.
- Concrete delivery, concrete pours and related construction methodologies will be part of the procedure agreed with the contractor to mitigate any possibility of spillage or contamination of the local environment. Particular attention will be paid during the pouring process in order to avoid leakages or spills of concrete;
- Temporary stockpiles will be monitored for leachate generation. These stockpiles will be placed within designated areas (C649 – CIRIA, 2006b) and not located within 20m of any watercourses and wetlands or within 10m artificial surface water drainage features;
- Spill kits and hydrocarbon absorbent packs will be available and drip trays will be used during refuelling;
- Drainage wardens/silt socks will be placed around drainage gullies connected to the live network;
- Ongoing monitoring of the water receptors throughout the works;
- Excavated material will be segregated into inert, non-hazardous and/or hazardous fractions;
- Incorporate procedures for environmental awareness training for the main contractor's staff;
- Provide for a system of audit with regard to the effectiveness of the environmental operating procedures during the construction life cycle of the project; and
- Include an emergency response plan (ERP) detailing the procedures to be undertaken in the event of a spillage of chemical, fuel or hazardous wastes, fires or flood events.

Monitoring the impacts of the derogations

Verification of implementation

In order to verify the implementation of derogations and mitigation, all on-site works will be overseen and monitored by a qualified ECoW. The ECoW will oversee the implementation of the mitigation measures included in the EIAR and any other ecological requirements as part of the planning conditions and/or the derogation licence. The ECoW will have the power to give a stop works notice, should it be required. This will allow for the application of any corrective measures, if they are necessary to ensure mitigation measure (e.g. defective sound barrier needing replacing).

The ECoW(s) will continue to monitor all identified Otter holts and couches during the construction phase. The artificial holt will then be monitored by the appointed ECoW(s) throughout construction using camera traps. The ECoW(s) will also continue to monitor all identified Otter holts and couches during the scheme works to flag if they become active or change status (non-breeding vs. breeding) during any stage of the construction phase; and adjust mitigations and construction schedules to be in line with those proposed above for the current breeding holt, i.e., postponement where possible; provision of an additional refuge option (artificial holt) within the locality months prior to local works; and construction of disturbance screening hoarding where breeding / rearing period overlaps with essential time-sensitive works. In this event, the Fingal County Council Biodiversity Officer, alongside members of NPWS will be notified and consulted throughout the implementation of any further mitigation measures, as mentioned above, and an additional derogation license application must be immediately submitted to NPWS. No works can take place within 200m of new identified breeding holt until the derogation license has been granted.

Part of the role of the ECoW will be to monitor the stretch of the Royal Canal river within 200m of the red line boundary to record evidence of Otter and to look for signs of use of resting places. Site surveys will be carried out following guidance in Findlay and White 2026 and NRA 2006. This will include site surveys with the first visit being carried out at least 3 months prior to the start of the works to 3 months post construction.

This will provide a clear understanding of the use of the area immediately prior, during and post construction.

The ECoW will also monitor the site to ensure that working practices are in-line with required mitigation. The ecologist will brief the construction workers – and / or the fore team who will be required to brief staff – about Otter, and the obligations they have with respect to mitigation measures.

NPWS Liaison

The ECoW will be responsible for providing updates on the findings to the NPWS and for updating the derogation licence as required. The updates will be in the form of annual reports providing the results of the surveys carried out, with details on methodology, findings, and implications for Otter.

The ecologist will submit licence returns and apply for new derogation licence annually for the duration of the project.

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