

# WILD BIRD & BIODIVERSITY SURVEY No.2 of 3—MILL STREAM GREEN ZONE

# SKERRIES, CO. DUBLIN

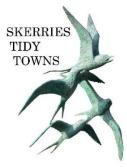
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BirdWatch Ireland (Fingal Branch)

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Edited by Frank Prendergast

Presented to



**Comhairle Contae Fhine Gall** Fingal County Council



#### **INTRODUCTION**

The Mill Stream rises outside the town of Skerries and has four tributaries. It flows eastwards towards the Dublin Road Roundabout for 4.4 km from its source in the townland of Killalane. It continues within the town for a further 1 km and enters the sea at the South Strand. The green zone associated with the Mill Stream creates a mostly east-west corridor which is the focus of this study and report (**Fig. 1**). The name 'Mill Stream' occurs in the rivers and lakes data base of the **E**nvironmental **P**rotection **A**gency and is used here. It is locally named 'The Brook' by some but this is incorrect usage of the term which means a type of stream.

The purpose of this study and report is to list the variety, number and conservation status of the wild bird species which inhabit the green zone adjacent to the Mill Stream on an annual and seasonal basis and make recommendations in the context of current biodiversity planning and national monitoring of bird species.<sup>1</sup> A species can be resident, a winter or summer migrant, or on passage (on route to another destination). Summer migrants arrive from March onwards and depart in September/October. Winter migrants arrive from September onwards and depart in early spring. Their number and variety are partly dependent on the diversity of plant and animal life in the green zone as represented by the number of extant species (**biodiversity**).

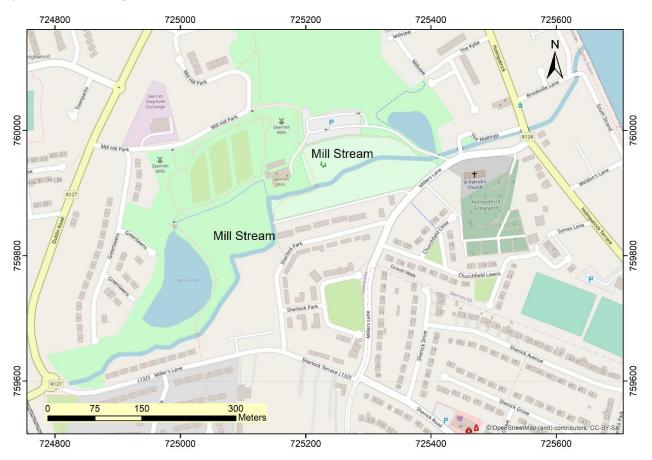


Figure 1. Mill Stream green zone, Skerries, Co. Dublin

The green zone shown in **Figure 1** has an area of approximately 11 hectares/27 acres, excluding the playing pitches on the northern side of Skerries Mills car park. The easiest access for pedestrians and cars is the main gate located on Millers Lane. Elsewhere, pedestrian access is restricted to a minimum number of minor paths/tracks or gates distributed around the perimeter.

<sup>&</sup>lt;sup>1</sup> (Fingal County Council 2022, BirdWatch Ireland 2022a)

# TOPOGRAPHY & HABITAT DESCRIPTION

The green zone has poorly connected public spaces on the northern side of the stream (**Fig. 2**). The terrain is broadly flat except for a small rise just north of Skerries Mills – the location of the larger windmill. If walking eastwards from inside the wall at the Dublin Road roundabout, the visitor arrives at the first of two freshwater ponds. This is fed by the Mill Stream (Category FL8- artificial lakes and ponds).<sup>2</sup> The Mill Pond is one hectare in size and considerably infilled with reed. This pond needs management to optimise the balance between open/non-open water for birds such as **little grebe**, **moorhen** and **swan**. Adjacent tree planting has been recently carried out. The second smaller spring-fed pond (Category FP) has a considerable amount of bulrush and nesting water birds. A small freshwater reed bed (Category FS1) lies between the Mill Pond and Skerries Mills, bordering the stream. The remainder of the zone is, variously, amenity grassland (Category GA2), small wet willow-alder-ash planting (Category WN6) and mixed broadleaved planting (Category WD1) associated with private gardens flanking the stream before it enters the sea. The entire zone is close to local primary schools thus offering potential for environmental education.

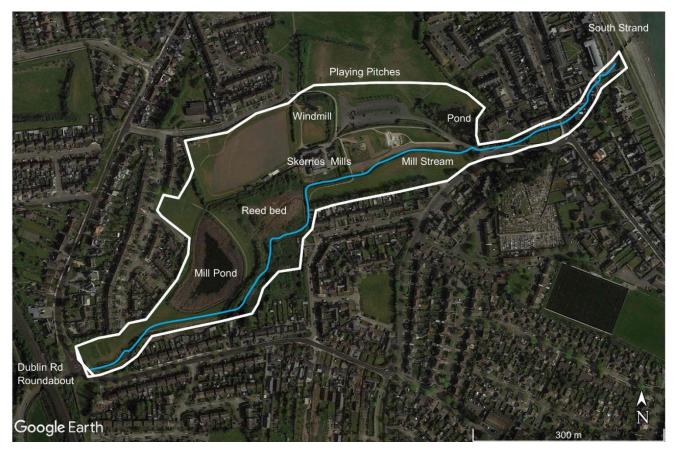


Figure 2.Mill Stream green zone (delineated by the white line) and the course of the Mill Stream (blue)from the Dublin Road Roundabout to South Strand.

# SURVEY METHOD

Volunteers from the Fingal Branch of BirdWatch Ireland field-walked the site in May timed to coincide with maximum bird activity. The volunteers are expert in visual identification and bird call/song recognition. The latter is especially evident during the breeding season in the months of April, May and June. The survey was conducted during this period for that reason. Dates were also chosen so as to record the presence of summer migrant species. The Branch has monitored bird populations here over decades.

<sup>&</sup>lt;sup>2</sup> (Fossitt 2000, Smith et al. 2011)

# SURVEY RESULTS

Thirty-eight species were recorded and these are alphabetically listed in **Table 1**.

Species	Saghas	Count	Resident	Summer	Comments	Conservation status
Blackbird	Lon dubh	17	$\checkmark$			Green
Blackcap	Caipín dubh	2	$\checkmark$			Green
Blue Tit	Meantán gorm	4	$\checkmark$			Green
Chaffinch	Rí Rua	3	$\checkmark$			Green
Chiffchaff	Tiuf-teaf	2		$\checkmark$		Green
Collared Dove	Fearán baicdhubh	2	$\checkmark$			Green
Coal Tit	Meantán dubh	1	$\checkmark$			Green
Dunnock	Donnóg	5	$\checkmark$			Green
Goldfinch	Lasair choille	18	$\checkmark$			Green
Greenfinch	Glasán darach	2	$\checkmark$			Amber
Grey Heron	Corr réisc	2	$\checkmark$			Green
Grey Wagtail	Glasóg liath	2	$\checkmark$			Green
Herring Gull	Faoileán scadán	5	$\checkmark$			Amber
Hooded Crow	Caróg liath	1	$\checkmark$			Green
House Martin	Gabhlán Binne	10		$\checkmark$		Amber
House Sparrow	Gealbhan binne	45	$\checkmark$		3 colonies	Amber
Jackdaw	Cág	9	$\checkmark$			Green
Kingfisher	Cruidín	1	$\checkmark$			Amber
Linnet	Gleoiseach	7	$\checkmark$			Green
Little Grebe	Spágaire tonn	3	$\checkmark$			Green
Magpie	Snag breac	2	$\checkmark$			Green
Mallard	Mallard	7	$\checkmark$			Green
Mistle Thrush	Smólach mór	2	$\checkmark$			Green
Moorhen	Cearc uisce	3	$\checkmark$			Green
Mute Swan	Eala bhalbh	6	$\checkmark$			Amber
Pied Wagtail	Glasóg shráide	2	$\checkmark$			Green
Reed Bunting	Gealóg ghiolcaí	2	$\checkmark$			Green
Robin	Spideog	4	$\checkmark$			Green
Rook	Rúcach	17	$\checkmark$			Green
Sand Martin	Gabhlán Gainimh	4		$\checkmark$		Amber
Song Thrush	Smólach ceoil	3	$\checkmark$			Green
Starling	Druid	21	$\checkmark$			Amber
Swift	Gabhlán gaoithe	14		$\checkmark$		Red
Tree Sparrow	Gealbhainn crann	3	$\checkmark$			Green
Treecreeper	Snag	2	$\checkmark$			Green
Willow	Ceolaire sailí	4		$\checkmark$		Green
Woodpigeon	Colm coille	14	$\checkmark$			Green
Wren	Dreolín	5	$\checkmark$			Green
Species recorded		38				

**TABLE 1.**Species recorded in the Mill Stream green zone (ordered alphabetically).

The columns in **Table 1** give the common bird names in English and Irish<sup>3</sup>, the highest total recorded at the time of survey, and whether species are resident (all-year) or are a summer visitor (no winter migrants were recorded). Where a colony was observed, these are noted too. The last column in Table 1 indicates the conservation status of each species.

The conservation status shown in **Table 1** is described for each species using three colour codes based on an internationally recognised Green-Amber-Red system of the IUCN.<sup>4</sup> This provides the list of **Birds of Conservation Concern** in Ireland as explained below.<sup>5</sup>

**Green list** — **t**hese are species which are **not** showing moderate or severe declines and do **not** fit into the Amber or Red categories.

Amber list — these are species with an unfavourable conservation status in Europe and whose population or range has declined moderately in recent years.

**Red list** — these are species that are g**lobally threatened** according to the IUCN criteria and whose population or range has **declined rapidly** in recent years.

The species and their number in Table 1 are further illustrated using a pie-chart (**Fig. 3**). Counts are ordered clockwise from high to low.

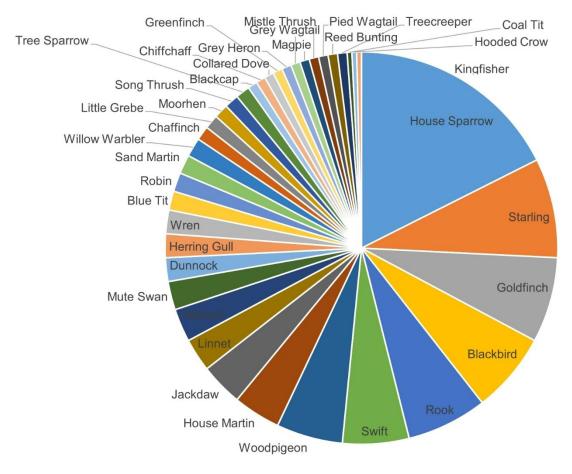


Figure 3. Species recorded (38) in the Mill Stream green zone ordered by frequency.

<sup>&</sup>lt;sup>3</sup> (BirdWatch Ireland 2022b)

<sup>&</sup>lt;sup>4</sup> (IUCN 2022)

<sup>&</sup>lt;sup>5</sup> (BirdWatch Ireland 2021)

### **DISCUSSION & RECOMMENDATIONS**

The Mill Stream and associated green zone which is a floodplain within the town boundary are an important wildlife corridor providing a rich biodiversity including broad-leaved trees, wild flowers and grasses giving ground cover, and freshwater habitats. The level of water in the stream is shallow (<0.5 m) for most of the year. During periods of high rainfall it is subject to flooding due to the tributary system being 13. 3 km in length (**Fig. 4**). This makes the water quality highly subject to the effects of run-off from any nitrogen-rich fertiliser and agricultural slurry from upstream. The **diversity of aquatic species** in the stream is not part of this survey but must be considered a vital part of the whole ecosystem and worthy of monitoring and protection. Hedgerow planting and management could be enhanced with obvious benefits for insects and birdlife. Overground electricity power lines are, currently, a hazard for flying swans.



Figure 4. Mill Stream (looking west); tributary system (inset). Map and photo by Frank Prendergast.

**Table 1** and **Figure 3** show thirty-eight species of wild bird are present along the Mill Stream green zone. This number is remarkably high and includes the amber-listed **kingfisher** occasionally seen fishing in the wooded section between Holmpatrick and South Strand. The green-listed **sedge warbler**, a summer migrant, formerly bred on the banks of the stream in the section shown in **Figure 4** but no longer does so due to historic cutting of the vegetation. That practise has now been reversed and may encourage the return of this species in due course. The migratory **swift**, a red-listed species, is present in small numbers and nests nearby. A pair of **reed bunting** is present and breeding in the reed bed.

#### COMMENTS AND RECOMMENDATIONS

- Wild bird populations are a critical indicator of biodiversity richness.
- Thirty-eight species of wild bird use the Mill Stream green zone corridor as a feeding and nesting resource and require continuing conservation and protection.
- Fingal County Council are to be congratulated for their commitment to the provision of wild meadow margins along the Mill Stream and for supporting tree planting initiatives by Skerries Tidy Towns.
- Presence of the amber-listed Kingfisher is considered significant but dependent on good water quality and aquatic life.
- The sedge warbler formerly bred in the uncut margins bordering the Mill Stream as shown in Figure 4. Widening the southern uncut margin to 2–3 m would encourage its return.
- The red-listed swift, a summer migrant, is a magical sight overflying the corridor. Current collaboration between Fingal County Council and BirdWatch Ireland will see the provision of artificial nesting blocks on the north gable of the Carnegie Library (under refurbishment). This will likely lead to an expansion of their number, currently about fourteen.
- Consider appropriate rehabilitation/rewetting of the reed bed to enhance its wildlife value.
- Provide a boardwalk through the reed bed to channel pedestrians who currently cause damage to this part of the ecosystem
- A boardwalk would also connect with the pathway leading to Skerries Mills.
- Provide a pedestrian gate at the Dublin Road Roundabout to give access to the course of the Mill Steam and allow users to walk its entire length – a proposed Mill Stream Nature Trail.
- The content and findings of this report, along with No.1/3 (Ballast Pit) and No.3/3 (Red Island/South Strand zone) suggest all three zones (nominated by Skerries Tidy Towns) are a corridor linking places for nature within urban spaces that will improve biodiversity locally.
- The objectives of these three reports are consistent with the aims of the International Union for Conservation of Nature, especially data gathering and analysis, advocacy and education.
- Disseminate these reports via Skerries Tidy Towns, Fingal County Council and BirdWatch Ireland (Fingal Branch) – a triangle of common interest, to maximise impact and create greater public awareness and engagement with the biodiversity and conservation of the Mill Stream green zone.

Selected birds observed in the Mill Stream green zone are shown in the **APPENDIX**. To discover more about Ireland's birds visit BirdWatch Ireland at <u>https://birdwatchireland.ie/irelands-birds-birdwatch-ireland/;</u> for information on local wild birdlife visit Fingal Branch of BirdWatch Ireland <u>https://bwifingal.ie/</u>.

#### ACKNOWLEDGEMENT

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# APPENDIX—Selected species of the Mill Stream green zone

#### Kingfisher

Very distinctive when seen in flight with its coloured plumage especially the back, rump and tail which are a bright electric blue. Easily overlooked if perched motionless on a branch beside a stream or river on the lookout for fish. The diet is various species of small fish (stickleback, minnow and chub) and larger aquatic insects caught by plunge-diving from a perch or while hovering. Kingfishers breed in tunnels dug in vertical banks along streams and rivers.

#### **Reed Bunting**

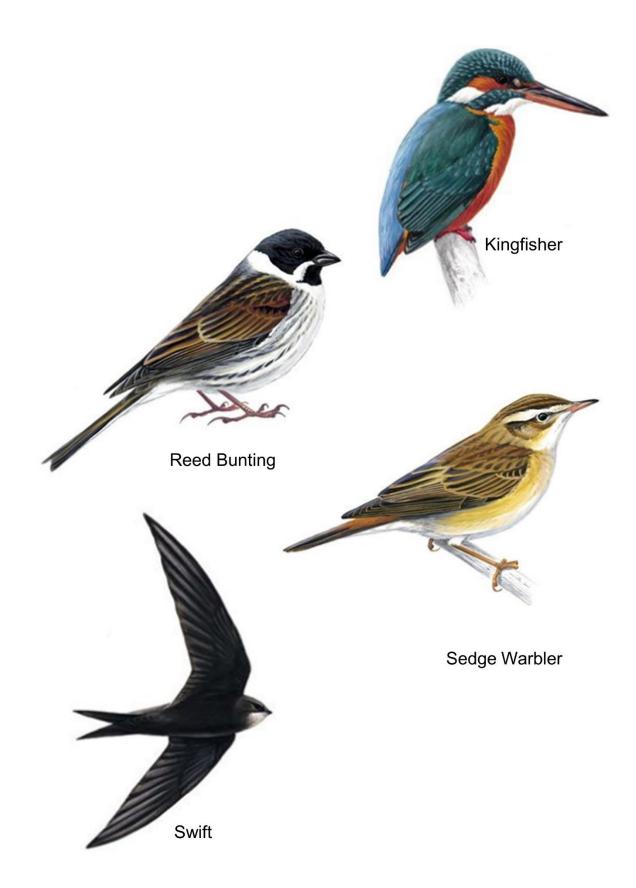
Adult summer males have a distinctive black neck and throat, with a prominent white collar on the neck and a small white stripe from the bill to the neck. Feeds on various seeds and grains, as well as insects during the breeding season.

#### Sedge Warbler

Widespread summer visitor to wetlands from April to September throughout Ireland. The song is a loud, excited mix of various phrases and which may include some mimicry of other bird songs. Feeds almost exclusively on insects and other invertebrates. Sedge Warblers breed on the edge of wetlands, especially in areas of wet grassland.

#### Swift

About the same size as a swallow with dark plumage. Spends virtually all of its life airborne and is never seen resting on wires like swallows and martins. Has a distinctive shape in flight with scythe shaped wings held straight out from the body. One of the fastest flying birds. Breeds throughout Ireland, usually in small recesses in buildings, both occupied and derelict.



Source of images: <u>https://www.rspb.org.uk/birds-and-wildlife/wildlife-guides/bird-a-z/</u>