



BirdWatchIreland
protecting birds and biodiversity

Saving Swifts



An Roinn Cultúir,
Oidhreacht agus Gaeltachta
Department of Culture,
Heritage and the Gaeltacht

Compiled by Ricky Whelan, Will Hayes, Brian Caffrey (BirdWatch Ireland)

Design by Penhouse Design

The content is drawn from a host of guidance materials produced in recent years including the work of Swift Conservation UK (Edward Mayer), Swift Conservation Ireland (Lynda Huxley), Northern Ireland Swift Group and the RSPB while drawing on the knowledge and experience of BirdWatch Ireland staff members and the branch network.

We thank all those who provided photographs to illustrate this document Kevin Collins, Catherine Casey, Ricky Whelan, Dermot Doran, Will Hayes, Lynda Huxley, Bridie Finlay, Peter Cush, Dick Coombs, Richella Duggan, Helen Burke, Triona Finnen, Anton Krastev and Swift Conservation UK. Our thanks also to the RSPB for allowing the use of photographs and illustrations from its picture library.

Thanks to Catherine Casey (Heritage Officer, Laois) for coordinating all aspects of the project and for reflecting the views and enthusiasm of the local authority heritage officer network in the jurisdictions of Dublin City, Galway County, Kildare, Kilkenny, Louth, Offaly, Meath, Roscommon, South Dublin and Wicklow.

This document was funded by The Department of Culture, Heritage and the Gaeltacht through the National Parks and Wildlife Service's National Biodiversity Action Plan Fund.

Special thanks to:



An Roinn Cultúir,
Oidhreachta agus Gaeltachta
Department of Culture,
Heritage and the Gaeltacht



Comhairle Contae Chill Mhantáin



Kilkenny
County Council

Comhairle Chontae
Chill Chainnigh



Comhairle Chontae na Gaillimhe
Galway County Council

Kildare County Council
Ag fánaíocht don phobal



Comhairle Cathrach
Bhaile Átha Cliath
Dublin City Council

Comhairle Contae
Átha Cliath Theas
South Dublin County Council



Roscommon
County Council



comhairle chontae na mí
meath county council

Contents

Introduction	4
Why have we produced these guidelines?	4
Who is this document for?	4
What is in this document?	4
What are Swifts?	5
Birds that might be confused with Swifts	6
Swifts are in trouble	7
Factors affecting Swifts	8
Taking action for Swifts	9
What can I do?	9
What can my community do?	10
What actions can public bodies take?	11
Actions: architects, developers and building professionals.	11
Advice: maintaining existing sites	12
Retaining nest sites	12
Advice: installing Swift nest boxes	13
Nest box types	13
Choosing the site	14
Fitting nest boxes	15
DIY Swift nest box design	15
Advice: installing caller systems	16
The call	16
Tips	16
Technical advice	17
Advice: installing in-built Swift brick and boxes	18
What is a Swift brick?	18
Choosing bricks.	18
Why use Swift bricks?	18
Positioning bricks	18
Fitting the bricks	18
How many bricks should be used?	18
Advice: creating Swift nest places in eaves	19
Specifications	19
Advice: finding grounded and injured Swifts	20
Tips on surveying Swifts	21
Case studies	22
Castlebar Swimming Pool	22
St. James's Hospital	23
Crescent Arts Centre	24
Mullingar Courthouse	25
Dermot Doran's House	26
St. Rynagh's National School	27
Useful links	28
Swift groups	29
About BirdWatch Ireland	30



Introduction

Swifts are FAST!
The top speed recorded
by a Swift in a recent
study was over 110km
per hour.

Why have we produced these guidelines?

Swifts in Ireland are in decline. We have lost 40% of our Swifts in the last ten years. Many groups across Ireland and the UK have taken action to help Swifts in recent years, but much more work is needed. Lots of information on Swifts, from nest box design to building renovation, was already available from different places, so this document aims to bring together all the relevant guidelines into one place.

Who is this document for?

This document is designed as a guide for anyone who wants to take practical measures to help Swifts, at a small or large scale. Whether you are a home owner or business person hoping to provide a nest site at your property, or a local authority motivated to include provision for Swifts in County Development Plans, this document is relevant to you.

These guidelines are aimed at all groups and individuals who want to help conserve Swift populations in Ireland - Tidy Towns groups, local authorities, schools, businesses, home owners, community groups, planners and architects.

Swifts are often mistaken for Swallows and Martins but they are actually more closely related to Hummingbirds!

What is in this document?

The following pages include information on:

- Swift ecology and conservation status
- Advice on:
 - » Looking after existing nest sites
 - » Installing nest boxes and nest bricks
 - » Installing caller systems
 - » Nesting places in eaves and soffits
 - » What to do if you find a grounded or injured Swift
- Taking action for Swifts
- Case studies
- Useful links and information on Swift groups in Ireland



Making nest boxes

What are Swifts?

Swifts are a family of birds with around 100 different species distributed across the globe. Although similar in appearance to Swallows and Martins, the Swift's nearest relatives are thought to be the Hummingbirds, native to North and South America.

The Common Swift (*Apus apus*) is the only Swift species that we have in Ireland. It is a small migratory bird (larger than a Swallow, smaller than a Starling) which arrives in Ireland to breed from southern Africa in May and will depart by late August.

Swifts pair for life and breed throughout the country. They are more common in urban areas, building small, cupped nests in small crevices in buildings, as well as in the eaves of houses. Natural nesting sites include holes in trees and cliff crevices, but the species has evolved over time to nest mostly in buildings.



Swifts are site-faithful, meaning they will return to the same nest site for many years.

Swifts spend most of their lives in flight, drinking, feeding, mating and even sleeping in the air. Non-breeding Swifts can spend up to a year or more in continuous flight.

The scientific name *Apus apus* means 'without feet,' which actually refers to the Swift's short legs rather than to any lack of feet. Swifts' legs and feet are adapted to cling to vertical surfaces rather than perching on wires and walking on the ground.



Swifts close to nest site in Cahir, Co. Tipperary

If they find themselves on the ground, it can be difficult for them to take off again. Swifts feed on airborne invertebrates (spiders, flies and other small insects) captured in flight. They are among the fastest of birds, with our Common Swift able to reach speeds of over 110km per hour.





The Swift's call is a loud, piercing scream and Swifts will often form 'screaming parties' on summer evenings, when 10-20 Swifts will gather in group flight above their nesting area, calling out to each other excitedly.

The average Swift weighs about 40g – the same weight as a Cadbury's Creme Egg!

Birds that might be confused with Swifts

The arrival of Swifts, Swallows, House Martins and Sand Martins really marks the beginning of summer, but it's easy to mix up these species, especially when they are flying. The good news is that there are key differences between these species, which can make telling them apart relatively simple, once you know what to look out for.



Bird	Size	Appearance	Nest site	Time in Ireland
Common Swift 	16-17cm long with a wingspan of 38-40cm	Blackish-brown, except for a small, white chin-patch. Short tail and long, sickle-shaped wings resembling a boomerang.	Cavity-nester, usually in eaves of houses.	May to late August
Barn Swallow 	17-19cm long with a wingspan of 32-25cm	Primarily dark blue, but with a dark-red face and creamy-white breast and belly. Adult bird has long, forked tail.	Bowl-shaped nests made out of mud, built in sheltered corners in the rafters of barns or outhouses.	mid-March to late September
House Martin 	13cm long, with a wingspan of 26-29cm	Steel-blue or almost black above, with obvious white rump and short, forked tail. Underside white, including underwings.	Builds a dome-shaped nest out of mud, usually under the eaves of houses.	mid-March to late September
Sand Martin 	12cm long with a wingspan of 26-28cm	Light-brown above, including rump, and with short, forked tail. Throat and belly white, but with noticeably thick brown band across breast.	Nests in burrows dug into riverbanks and in quarry faces. Common in rural areas, especially along rivers and lakesides.	mid-March to September

If you see a bird perching on a telephone wire or post it won't be a Swift, because Swifts do not perch like other, similar species.



Swifts are in trouble

The Swift is perhaps the most intriguing of our urban bird species. In recent decades, Swift numbers have been falling in many parts of their range and the area in which they are found is shrinking. BirdWatch Ireland's most recent scientific data show a worrying drop of almost 40% since 2008. Swifts are now on the amber list of birds of conservation concern.

Throughout most of their breeding range, Swifts nest in cavities in walls or in spaces in eaves of houses and old buildings. Because of this, they are a well-known bird in urban areas. They are colonial, which means they nest in groups, or colonies. Swifts nest in every county in Ireland and, while we don't yet have detailed surveys for every county, it's thought that numbers are falling in all counties, mirroring national and international trends.



Dermot Doran fitting Swift boxes and bricks to attract nesting Swifts

Swifts are long-lived for small birds. The British Trust for Ornithology's (BTO) oldest recorded ringed Swift was 17 years, 11 months and 5 days old.



John Kendrick in front of his house full of Swift nests in Cahir

Reasons for the scale of the declines are not fully clear, but we think that loss of nest sites due to building renovations and construction of modern buildings without suitable cavities is a large part of the problem. The impacts of climate change and falling numbers of invertebrate food are also important.

Luckily, Swifts are not without friends and many individuals and groups have been working tirelessly to try to stop Swift numbers from falling any further. The Northern Ireland Swift Group has taken the lead over many years and Swift Conservation Ireland has pioneered new approaches to nest box projects, especially in the west of Ireland.

Groups such as the Dublin Swift Conservation Group have also had major successes. BirdWatch Ireland has coordinated a successful citizen Science-led National Swift Survey since 2014 and works to create awareness, provide advice and support the good work of its branches throughout Ireland. Great work has been done, but there is more to do to maintain populations and increase Swift breeding numbers nationally.

We hope that these guidelines, produced with the support of local authorities across the country, as part of the National Biodiversity Action Plan, will help to empower more people to take action for Swifts in their own communities.



Factors affecting Swifts

What happens?	The result	How can we help?
<p>Refurbishment of buildings</p> <p>Accidental removal of access to nest sites</p> <p>Scaffolding or hoarding can prevent adult Swifts from getting to their eggs or chicks</p>	<p>Loss of breeding sites – partial or whole loss of colony</p> <p>Eggs chill, chicks starve</p>	<p>Map the nest entrances before works commence and retain nest entrance gaps</p> <p>Make sure works are carried out outside the Swift breeding season on sites known to be important for Swifts</p>
<p>Demolition of buildings</p> <p>When a building is demolished, all nesting sites there are lost</p>	<p>The loss of an entire breeding colony</p>	<p>Erect new nest boxes close by. Integrate nest sites into new building development</p>
<p>Modern building developments</p> <p>They have little or no access for Swifts</p>	<p>Swifts are unable to find suitable nesting opportunities</p>	<p>Integrate Swift nest cavities into fabric of building or fix nest boxes to outside of walls</p>
<p>Climate change</p> <p>Leads to higher/lower average temperatures and more frequent severe weather events</p>	<p>Birds can be affected on migration and they may find it increasingly difficult to find insect prey during severe weather events</p>	<p>We can all take action in our own lives to help prevent further climate breakdown. We can also make decision-makers aware of our concerns</p>
<p>Growing food shortages for Swifts</p> <p>Over-use of pesticides, habitat loss and climate change have all led to declines in insect abundance</p>	<p>Less food available means lower fledging success</p>	<p>Follow the advice and recommendations of the All-Ireland Pollinator Plan</p>



Swifts hunt at about 40km per hour and drink by gliding over smooth water, taking sips as they go.



Taking action for Swifts

We can all do something to help Swifts, whether it's in our own homes, in our communities or by advocating for change at a national level.

What can I do?

- First, **find your Swifts** - to help Swifts it is vital to identify where they nest locally.
- If you are lucky enough to have nesting Swifts at your home, make sure to **leave nest sites undisturbed**.
- When repairing or replacing fascia, soffit or guttering, remember to **leave access holes** accessible to Swifts.
- **Carry out maintenance works** on those parts of your house only during September to May, i.e. outside of the Swift nesting season.
- **Avoid restricting access** for birds approaching or leaving the nest. Swifts drop from the nest entrance when leaving and need a clear flight-path to and from the nest. Any overhanging ivy, trees or other barriers can impede their access.
- **Erect specialised Swift nest boxes** or Swift bricks to attract nesting Swifts and to provide additional nest sites for them.
- If you have identified Swifts nesting at your home, **let the National Biodiversity Data Centre or your local BirdWatch Ireland Branch know**.
- **Cats can catch and kill Swifts**. Remove any items that might allow cats to climb close to nest sites.
- If you find a grounded Swift at your property, follow the instructions given in the **'Finding Grounded and Injured Swifts'** section of this document.



Cats can catch and kill Swifts – remove any items that might allow cats to gain access close to nests

Swifts are migratory birds that spend the winter in sub-Saharan Africa. There, they follow the rains, taking advantage of insect increases after rainfall.



What can my community do?

- **Organise a nesting Swift survey** in your local area to find Swift nest sites and colonies.
- If you are lucky enough to have nesting Swifts in your community, make sure to **maintain Swift nest sites**.
- **Identify buildings** being used by nesting Swifts that may be at risk from dilapidation or development.
- **Organise a Swift Awareness Event** in your local community or school. This will fit well with the Biodiversity flag of the Green-Schools programme and can also contribute to biodiversity actions under your local Tidy Towns plan.
- **Plan and undertake a Swift nest box project**, erecting nest boxes at suitable locations on buildings in your community. Two-storey houses, businesses, schools and other public buildings can be perfect for Swifts.
- **Encourage building owners to protect Swifts** by inviting them to your Swift Awareness Event and helping them to find out what Swifts need.
- Work with groups such as local BirdWatch Ireland Branches, Men's Sheds and Tidy Towns to **develop projects to help Swifts**.
- **Document your work and report on your efforts** for Swifts in your Tidy Towns submissions – these efforts could lead to increased points in the “Wildlife, Habitats and Natural Amenities” category.
- **Report to BirdWatch Ireland** if a building with a known Swift colony is up for renovation or development. These interventions can be vital to the survival of local Swift breeding populations.
- **Make submissions to the local authority** through the County Development Plan process to have provisions for Swifts made in new building developments such as schools, libraries or businesses.
- **Ask local businesses to help** by putting Swift information leaflets on display, running staff fundraisers to support Swift conservation locally or by sponsoring Swift events in the area.
- **Suggest ways for local schools to help**. For example, woodwork classes could build Swift nest boxes for the school and community.



Swift mural, Rialto, Dublin



Nenagh Tidy Towns Group at Nenagh Castle where a large Swift colony exists

What actions can public bodies take?

- **Make provision for nesting Swifts** in all new public buildings and retro-fit suitable public buildings with Swift nest boxes.
- **Encourage local Swift conservation projects** through funding and other supports.
- **Swift conservation and the provision of nest sites** could be included in County Development Plans, City and County Heritage Plans and Local Biodiversity Action Plans. Invite Swift expert groups to speak to planning and engineering staff.
- **Planners can recommend mitigation for the loss of Swift nest sites** and make provisions for Swifts (and other relevant wildlife, e.g. bats) in relevant planning applications, e.g. schools, commercial buildings, public buildings or any large development.
- **Public bodies can provide training** for relevant personnel who work with or maintain public or local authority-owned buildings.

Swifts' wings are long and narrow and are highly adapted for rapid flight. This means they do everything at speed!

Each "bolus" (ball of food) brought to the nestlings weighs just over a gram, and contains 300-1,000 individual insects and spiders.

Actions: architects, developers and building professionals

- **Make provision for nesting Swifts** when designing new buildings or redeveloping existing buildings.
- **Add extra Swift nesting places to buildings** that already have established Swift nesting colonies. Swift bricks and boxes can be used in these cases. Make sure you don't block off any existing nest sites.
- **Invite Swift expert groups to your offices** to discuss the topic of Swifts and integrating provisions for Swifts and other wildlife.
- **Encourage clients to make provisions for Swifts** in their buildings.
- Large-scale projects such as developing a commercial campus can include **provision for nesting Swifts and take wider ecological considerations into account during the landscaping phase**. For example, aquatic habitats can help in managing surface-water run-off while also providing excellent feeding habitat for Swifts and other insect-loving species.
- **Promote your company as ambassadors for Swifts and wildlife**. Celebrate your work for Swifts and your successes.



Advice: maintaining existing sites

While nest boxes are very positive, often the best way to help Swifts is by protecting the sites they already use. Repairs and renovations to buildings can lead to the loss of Swift nest sites. New fascia, soffit and roof repairs or re-roofing works often removes the access that nesting Swifts previously had. With awareness, care and planning, these impacts can be avoided.

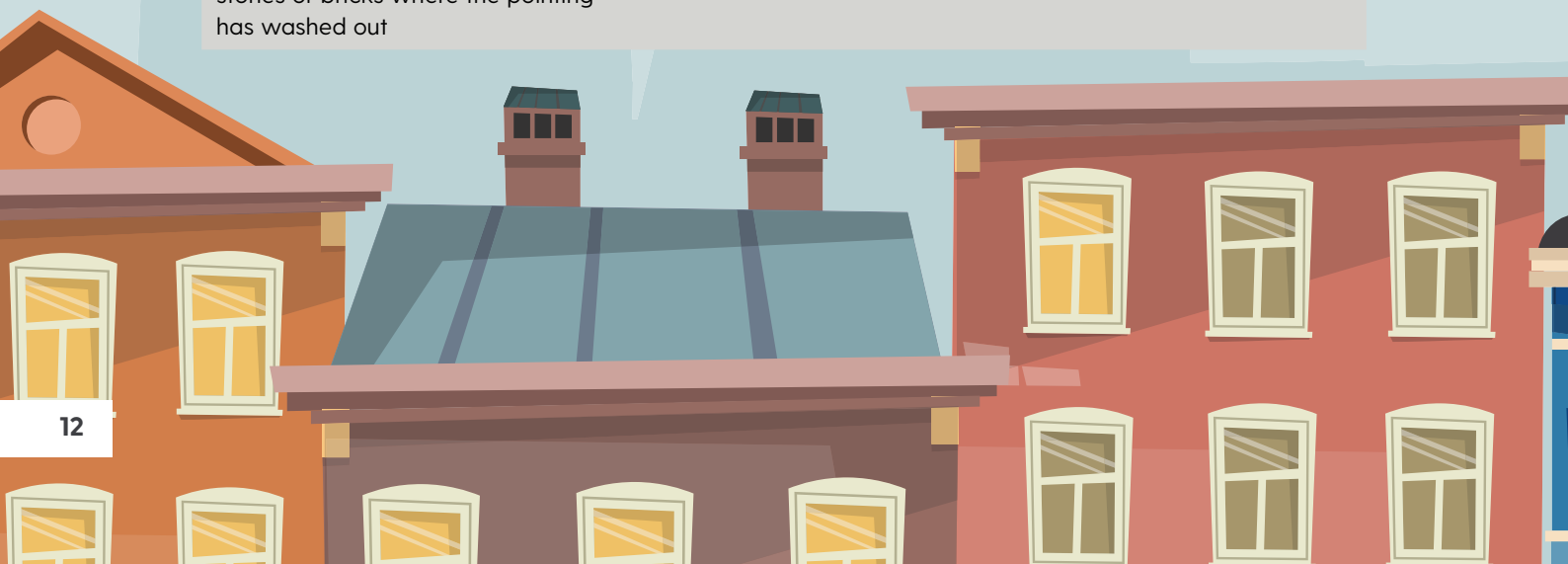
Under the European Union Birds Directive, all wild birds are protected. Article 5 of the directive states that they are protected especially during the period of breeding and rearing chicks. Work to known Swift colonies should therefore be avoided during the breeding season.

Follow these guidelines when planning work where Swifts are nesting:

1. First find out whether your site is used by nesting Swifts. Check with BirdWatch Ireland or the National Biodiversity Data Centre.
2. Never re-roof or replace fascia and soffits of a building used by nesting Swifts during the breeding season of May to September.
3. Leave existing Swift nest places undisturbed by any works.
4. Preserve the Swifts' access holes or make new ones to match the old exactly.
5. Do not block access with scaffolding or hoarding and do not net or wrap areas where Swifts are nesting.

Retaining nest sites

Nest site location	Solution
Inside eaves - in "open" eaves, under the bottom row of tiles, above the gutter, just inside the roof-space	The simplest and best solution is to leave the eaves open. Alternatively, cut slots in the soffit or facing boards to match the old entrances
In holes - in holes in walls, for example where pipes have been removed	If they will not cause a problem, just leave old holes or fit a Swift brick to provide an alternative nest place. For the Swifts to accept it, the Swift brick must be placed precisely where the old nest and its entrance were located
Behind flashings - on brick ends or in holes under loose or missing flashings on chimneys and skylights	Offset or lengthen flashings and ridge or end tiles to let the Swifts back in without affecting weather-proofing
Inside gables - behind bargeboards and gables, on the brick ends	Either leave well enough alone or else fit simple wooden nest-places behind the bargeboards
Under tiles - under loose or displaced tiles, on the roof timbers or felt	Reinstate the tiles, keeping the old gaps where the Swifts gained entry exactly where they were. You can do this easily by inserting wedges of cement and pieces of tile beneath the new tiles, to lift them by 30mm to provide access for the Swifts
Missing pointing - in gaps between stones or bricks where the pointing has washed out	Leave the access to where the Swifts are nesting unpointed.



Advice: installing Swift nest boxes

One of the best ways to provide permanent Swift nest sites is to install specially designed Swift nest boxes. They are available commercially or can be made to approved designs. The type chosen will depend on your building, budget or ability to build your own. Nest boxes can be installed to provide more nest sites at an established nesting colony or to create a new nesting site.

Swifts are birds of the sky, rarely landing. They feed, drink, mate and even sleep on the wing. They may fly without stopping for a year or more.

Nest box types

Type	Description	Nest cavities	Pros	Cons
Wooden	Pressure treated timber, commercially available, designs vary	Single nest cavity	Inexpensive and lightweight	Less durable than concrete, limited lifespan, supplied as single-cavity nest boxes
Concrete (composite)	Moulded with concrete composite mix, commercially available in a range of shapes and sizes	One to three nest cavities	Durable, long lifespan, available in a range of sizes, shapes, colours	Relatively expensive, heavy
Marine Ply	Marine plywood is designed to last longer in humid conditions and uses water proof glue	Flexible	Inexpensive, bespoke-built	Limited lifespan in the humid Irish climate. Incorrect designs of "home-made" nest boxes can affect nesting success
Magnesium Oxide	Lightweight building material	One to three nest cavities	Lightweight, environmentally friendly, long lasting, Irish manufacturer/supplier	Less durable than composite boxes
Fibreglass	Bespoke-built	Flexible	Lightweight	Not widely available



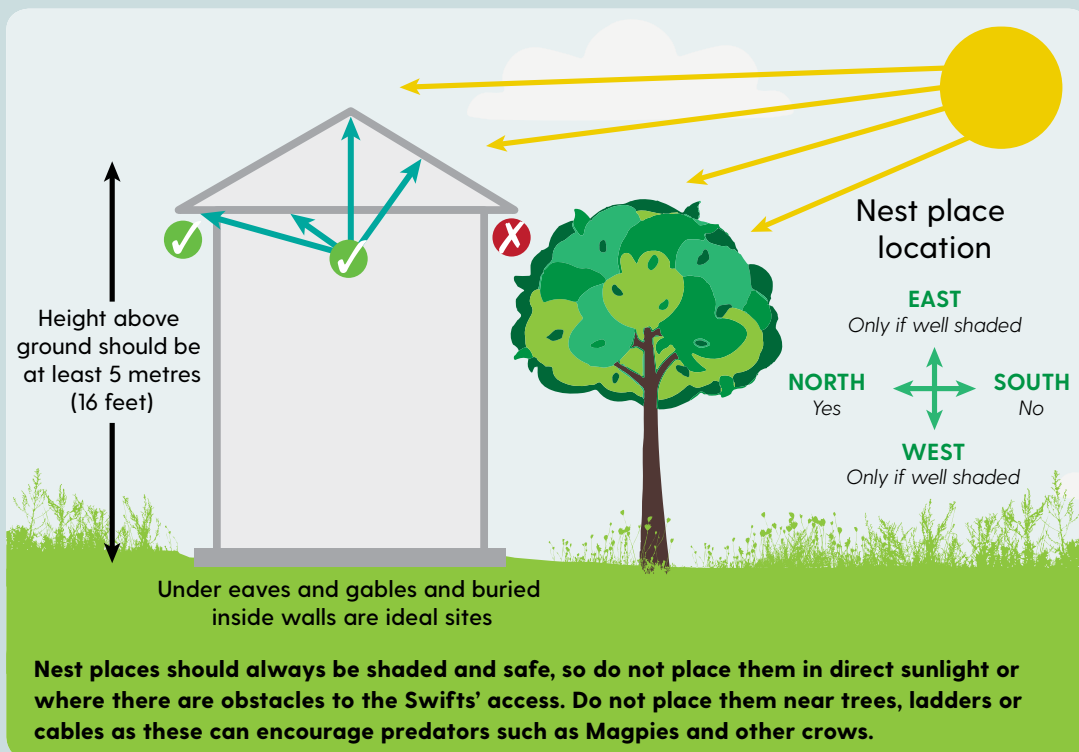
Double nest-cavity Schwegler Swift nest boxes installed at Mullingar Courthouse

Adult Swifts can survive for two to three days without feeding, chicks can survive for five or more. This allows Swifts to survive periods of bad weather, when they can't feed.



Choosing the site

Place the nest box or brick on a side of the building that gets some shade during the day. If possible, install it under an overhang or under the eaves, to give it protection from the weather and the heat of the sun. It should be sited at least five metres (16 or more feet) above ground, with clear, adjacent air space so the Swifts can access it in high-speed direct flight (they usually fly straight in to avoid the risk of predation). Make sure that predators such as cats, crows, squirrels and rats do not have easy access to the nest, for example by being able to climb up creepers or flying in from nearby trees. Where possible place boxes up close under fascia/soffit or gutter to stop predators perching on top. Avoid positioning nest boxes above obstacles where possible, Swifts drop from entrance holes before taking flight meaning they could accidentally collide with structures below the nest. Outdoor lights, flag poles and pipes are some examples. Always avoid placing boxes near to spotlights as birds can become dazzled by bright light whilst trying to enter nest sites in the late evening.



TIP

Swifts are colonial birds which prefer the company of other Swifts. With this in mind, always try to install a nest box with multiple nest cavities or attach several single-cavity nest boxes to a building

TIP

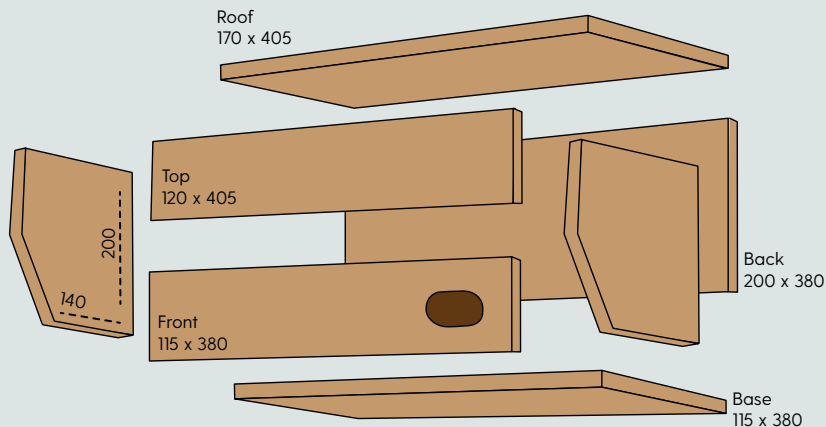
It is strongly advised to install a Swift calling system to attract Swifts and encourage them to take up residence at a new site

Fitting nest boxes

- Use strong, corrosion-resistant fixings suitable for the wall surface.
- Before fixing or servicing your Swift nest box, make sure your working conditions are safe, or employ a suitably qualified person if needed.

DIY Swift nest box design

The “Zeist” Swift box design is of Dutch origin and has been used widely in Europe to create new nest sites for Swifts. The template below gives the full specifications required. Boxes will last longer and are less likely to overheat when installed under a deep eave or soffit and out of direct exposure to the weather, including wind, rain and sunshine. The nest box **entrance size is important** - it needs to be suitable for Swifts to enter and also to limit the chance of other species taking up occupation. The entrance hole should be 28mm high x 65mm wide. Always use marine plywood where available, this will greatly increase the lifespan of the boxes



Swift nests are found hidden within walls and roof structures. In fact, if you can see a nest it's unlikely to belong to a Swift!

Advice: installing caller systems

Swifts look for nest sites at locations with established colonies. To increase the chances of attracting Swifts to a new nest location, a recording of a Swift call should be played. Swift calls can be broadcast from a small speaker placed as close as possible to the nest box or brick. New nest box sites where no lures are played are less likely to be successful in attracting nesting Swifts. Playing the calls greatly increases the chances of attracting Swifts but doesn't guarantee it will.



Speakers positioned close to nest box entrance will improve chance of Swifts finding their way inside.



Genesis Swift Boxes installed with caller system at Trim Town Hall

The call

Swift researchers recommend playing recordings of the Swift's call to attract prospecting Swifts. Many recordings of Swift calls can be found online but may not be effective in attracting Swifts. A proven call recording is available from Swift Conservation Ireland here: Swiftconservationireland@gmail.com.

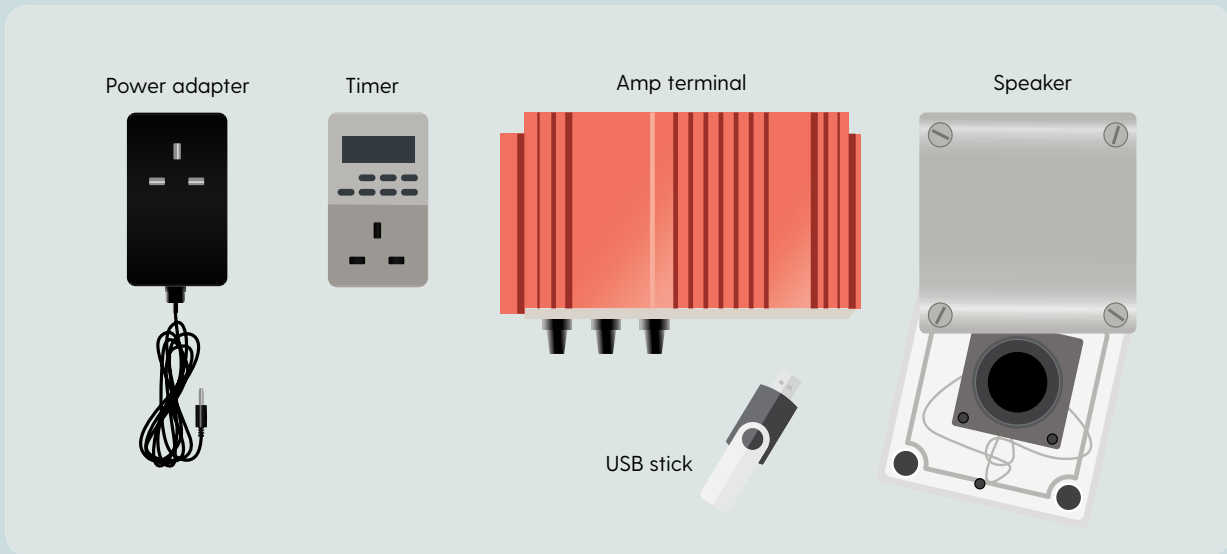
To broadcast Swift calls, a licence is required from the National Parks and Wildlife Service (NPWS). Your local NPWS Ranger can assist you with this or you can contact one of the expert Swift groups for assistance. More information on this is at npws.ie/licences/hunting, under the section on 'Use of Decoys, Lures and Scarecrows'.

Tips

- Volume should be set at a 'normal' noise level. Playing the call too loudly will distort the sound.
- It's a good idea to mount the speaker as close as possible to the nest entrance hole.
- Swifts look for nest sites during two specific time periods: in May and June (to nest that year) and in June and July (to nest the following year). The latter group are younger birds.
- Set your timer to play the call at the following recommended times:
 - » from dawn, for 3-6 hours
 - » in the evening, from 6.00pm to dark.
- Swifts will only look for nest sites in fine weather. Playing the calls in cold, wet weather is ineffective.

Technical advice

A Swift caller system needs a couple of key electronic components to work correctly. The most commonly used and easily installed system is described below.



You will need:

- A small external speaker or a speaker in a waterproof box.
- A 12v electronic amplifier.
- An electronic lamp timer or similar.
- Speaker wire (as much as needed to reach speaker from amplifier inside your house).
- A USB or SD card with the Swift call preloaded.

All of these items are available to purchase separately. Alternatively, Genesis Nest Boxes supplies the entire caller system and recommended call: genesisnestboxes.ie.

Assembly:

1. Fix the speaker waterproof housing to a surface as close as possible to the nest box entrance.
2. Feed the speaker wire into the housing and connect to the speaker using the wire connection.
3. Feed the speaker wire back into the building by whatever means available (through a drilled hole, under a roof tile, in through a window).
4. Connect the wire into the back of the amp in one of the terminals provided.
5. Plug the male end of the power adapter into the amp and the socket end into the timer and then connect to the power supply.
6. Insert your USB/SD card containing the preloaded Swift call.
7. Turn on your amp, set the volume and adjust your timer to the recommendations.

Advice: installing in-built Swift brick and boxes



What is a Swift brick?

Commercial Swift nest bricks are made from hollow brick or concrete composite designed to allow access by Swifts and manufactured to modern building regulation standards. They can be integrated into the walls of buildings during the construction phase.

Swift bricks provide safe, permanent, low-cost nesting sites for Swifts for the lifetime of the building. They are best installed into new-builds or during extensions and renovation works. Unlike externally fitted boxes they blend into the fabric of the building and for this reason are often the preferred choice for architects.

Choosing bricks

Swift bricks are available commercially and come in various sizes, shapes and colours, so it should be easy to find a brick that fits your building design. Manufacturers will supply technical information on Swift brick types to help you at the design stage.



Why use Swift bricks?

- They are as close as it gets to a “natural” nest site.
- The brick is available to nesting Swifts for the life of the building. Once occupied, it could be used by a single pair for many years.

Positioning bricks

- ✓ **Do:** Place bricks any aspect N, S, E or W. Bricks tend not to overheat the way that externally fitted boxes can.
- ✓ **Do:** Place bricks at least five metres above ground. Boxes can never be too high, so, if in doubt, go as high as possible.
- ✓ **Do:** Face brick entrances onto an open aspect – no overhanging vegetation, trees, walls or other obstacles – so that the birds can fly directly in and out unimpeded.
- ✓ **Do:** Place bricks side by side in rows.
- ✓ **Do:** Keep out of reach of pets or other potential predators.
- ✗ **Don't:** Place bricks near plate glass windows because they are a known collision hazard for birds.
- ✗ **Don't:** Place bricks directly above ledges or other obstructions. Swifts drop before taking flight and can collide with obstacles below the nest entrance.
- ✗ **Don't:** Stack bricks one above the other.
- ✗ **Don't:** Place Swift bricks near spotlights or later fit spotlights near Swift bricks.

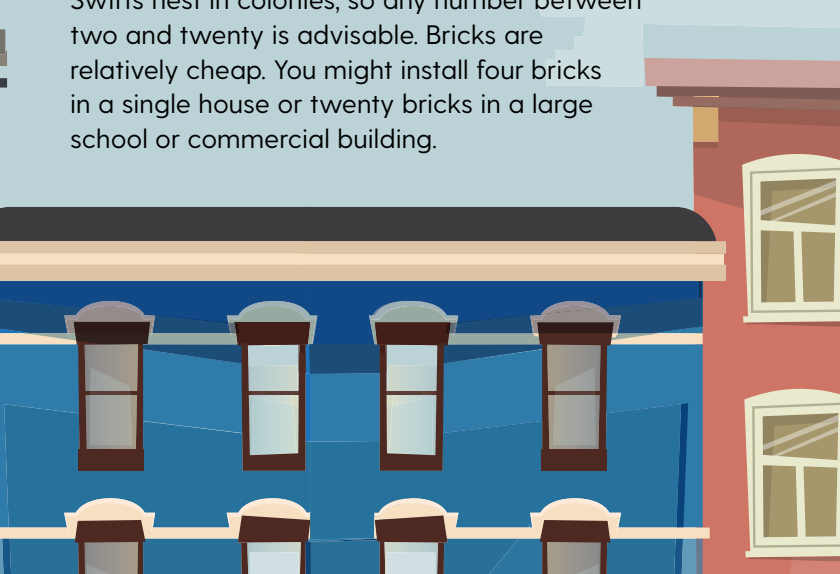


Fitting the bricks

Swift bricks are designed to fit alongside standard building materials and can be fitted by any experienced tradesperson.

How many bricks should be used?

Swifts nest in colonies, so any number between two and twenty is advisable. Bricks are relatively cheap. You might install four bricks in a single house or twenty bricks in a large school or commercial building.



Advice: creating Swift nest places in eaves

You can make alterations to the eaves of your property to create potential Swift nest sites or to make more nest sites available. Swifts need to gain entry to an internal space to nest.

Specifications

Boxed eaves, whether old or new, **timber, metal or plastic**, may all be converted at minimal cost for use by nesting Swifts. To nest in your eaves Swifts, require access to the space behind the fascia and soffit and inside this space they need individual nest compartments. **It's paramount to create individual compartments within the fascia and soffit of the eaves.** Without compartments birds can get lost or injured in the space or get into conflicts with other nesting Swifts. Remove facing boards (fascia) or soffit sections and install compartment walls using wooden sections which are easily cut to fit. Nesting Swifts require a minimum 300mm long x 150cm high (at wall) x 150cm deep (front to back), most modern eaves will meet or exceed these measurements. Individual compartments can be added at 300mm (or more) intervals along the length of the eaves but limit new nest compartments to the horizontal eave sections.



Swifts need an entrance hole to access an inner cavity which can be created in the fascia or soffit



Potential location for nest site entrance in a standard fascia and soffit

The nest **entrance size is extremely important** because it should be suitable for Swifts to enter but help restrict access to Starlings. The entrance hole should be cut to 28mm high x 65mm wide, any larger and they may allow Starlings to enter. Although adult Swifts will happily fly into a nest entrance from below it is advisable to cut the entrance hole into the fascia (facing out rather than down) at about 35mm from the "floor" to reduce the risk of chicks falling from the nest.

Refer to "Choosing the site" (page 14), when selecting the location for the new Swift nest compartments on your building. **Swifts compete for nest sites** and can get into aggressive encounters if they feel another bird is trying to steal a nest place so make sure to spread nest entrances out at 300mm intervals or more to fit with your internal compartments.

Existing open eaves are best left alone as they **allow Swifts access to the roof-plate** which is a common site for nests.

Another solution is to integrate specially build or bought Swift boxes directly into the eaves.

More detail on retrofitting your property with suitable Swift nesting sites see the Swift Conservation UK advice pages here:

<https://www.swift-conservation.org/>.

Advice: finding grounded and injured Swifts

Swifts sometimes find themselves “grounded”: adult birds can find it difficult to become airborne again and may require assistance.

Swift	What to do
Grounded	<ul style="list-style-type: none">• Find an open area, place the bird on the palm of your hand raised to shoulder height, face into the breeze and allow the bird to take off in its own time.• If the bird is hesitant to fly, you can gently move your hand up and down a little to allow the bird to feel the air beneath its wings.• If the bird is still reluctant or falls to the ground on attempting to take off it may be injured and require rehabilitation.
Injured	<ul style="list-style-type: none">• If a Swift is clearly injured, you should place the bird in a small cardboard box with ventilation holes and get in contact with a wildlife rehabilitator or Swift expert immediately.• Details of Irish wildlife rehabilitators can be found here: www.irishwildlifematters.ie/animals/contacts.html
Young	<ul style="list-style-type: none">• Nestlings can fall from nest sites prior to fledging which will result in them dying unless they are rescued.• In the majority of cases it is not possible to return them to the nest, so it is vital they are brought to a person or organisation specialising in wildlife rehabilitation.• To ensure the Swift safely gets to the wildlife rescue person, place the bird in a small cardboard box with ventilation holes.• The bird should remain calm when kept in a quiet and dark situation.• Because Swifts have a specialist diet they can be very difficult to care for.• We always recommend you contact an experienced wildlife rehabilitator or Swift expert.





Tips on surveying Swifts

Most Swifts arrive in Ireland in early May and they may stay until late August. The main nesting activity takes place in June and July, so these are the best months for surveying.

Survey during dry calm weather. Wet and windy weather is unsuitable.

Swifts are most active in the morning and evening. Surveying from 8am to 11am and 7pm to 10pm is best.

Swifts flying at roof level or loud “screaming” birds are the best indication that there is an occupied nest site nearby.

Swifts flying at a high level, well above the buildings, may not be local and, for the purposes of counting local colonies, should be ignored.

Young birds will fly close to nest entrances and bang against the structures. These are known as “bangers” and should not be mistaken with birds returning to an occupied nest site.

Take notes on the peak number of birds observed as well as precise details of birds entering and leaving nest site locations.

Swift sightings and nest location records should be logged to the National Biodiversity Data Centre: www.biodiversityireland.ie where a special Swift recording form can be found.



Swift investigating Swift brick nest boxes at Westport Town Hall



Swift Watch at Scoil Bhríde Killeshandra, Co. Cavan



Case studies



Photos showing the installation of Swift boxes at Castlebar Swimming Pool



Swift boxes installed by tradesmen at build stage



Castlebar Swimming Pool

Location	Project Coordinator(s)	Building Type
Castlebar, Co. Mayo	Swift Conservation Ireland	Public
Nest Types	Swifts Occupying	Project Partners
Integrated – Triple-cavity Schwegler “17A” Swift Nest Boxes x 8 (four in NE facing wall and four in NW facing wall)	Seven. (Several observations of Swifts entering and leaving seven of the nest boxes during the 2018 season with confirmed breeding expected in near future.)	Mayo County Council, PJ McLaughlin & Sons (main contractor)
Caller System Used	No. of Nest Sites Created	Year Initiated
Yes – under licence	24	Winter 2017

Project Summary

Swift Conservation Ireland (SCI) identified the potential for increasing available Swift nesting sites in Castlebar, Co. Mayo, when the building work had just commenced. In consultation with Mayo County Council, Swift Conservation Ireland met with the County Architect and Heritage Officer to request the provision of eight triple-cavity nest boxes to be integrated into the building at the build stage. In addition, the electrical contractor fitted an attraction calls system with two speakers (one speaker located near each set of nest boxes) to help Swifts locate the nest boxes. This work mirrors a partnership project between SCI and Mayo County Council in 2014 during the rebuild of Westport Town Hall. Four triple-cavity Schwegler 17A nest boxes were built in to a NE facing wall. By the summer of 2018 all of the nest boxes at the Town Hall were fully occupied.





Additional Swift nest boxes have been installed on hospital buildings



Buildings where natural Swift nest sites are found

St. James's Hospital

Location	Project Coordinator(s)	Building Type
James's Street, Dublin 8	Dublin Swift Conservation Group, The National Paediatric Hospital Development Board	–
Nest Types	Swifts Occupying	Project Partners
Externally Fitted/Integrated (second phase of works)	–	Swift Conservation Ireland
Caller System Used	No. of Nest Sites Created	Year Initiated
Not currently - plan to retrofit solar-powered caller system	18 (phase 1), 24 (planned – phase 2)	2015

Project Summary

St. James's Hospital is one of the few existing Swift nesting locations in Dublin 8. Swifts have been known to nest on the St. James's Hospital campus for many years. The Dublin Swift Conservation Group (DSCG) has been extremely active in raising awareness and campaigning for the protection of existing Swift colonies within the campus and for the creation of new potential nest sites. As a result of their actions and submissions made through the planning process the DSCG has influenced management at the hospital to carry out mitigation measures to protect existing nest sites (including the erection of six triple-cavity nest boxes) whilst also gaining a commitment to provide 24 integrated nest sites at the new National Paediatric Hospital campus.



Swift sculpture and interpretation panel highlights the Swift colony at Crescent Arts Centre



Swift bricks installed during renovation works



Crescent Arts Centre

Location	Project Advisors	Building Type
University Road, Belfast, BT7 1N Co. Antrim	Northern Ireland Swift Group	–
Nest Types	Swifts Occupying	Project Partners
Integrated - 200 potential nest sites maintained, and 25 lbstock Swift Nesting Bricks added to new build	Yes – 30 to 40 breeding pairs	Crescent Arts Centre and Heritage Lottery Fund (HLF)
Caller System Used	No. of Nest Sites Created and Maintained	Year Initiated
No – because of existing large colony of Swifts	25	2007-2011

Project Summary

A major (almost £10 million) project sought to completely refurbish, re-roof, modernise and extend the building. The Northern Ireland Swift Group, working with all the organisations involved sought to conserve and enhance the existing large Swift breeding colony which had existed in the roof of the building for more than 100 years. This was achieved, and the project was awarded a Biosphere Urban Wildlife Award for Excellence in 2010.





Photos showing the Swift boxes at Mullingar Courthouse



Mullingar Courthouse

Location	Project Coordinator(s)	Project Architects
Mullingar, Co. Westmeath	National Parks and Wildlife Service/ Bluett & O'Donoghue Architects	Bluett & O'Donoghue Architects
Nest Types	Swifts Occupying	Project Partners
Externally fitted – Double-cavity “17C” Schwegler Swift Nest Boxes x 6	Swifts observed actively prospecting during the summer of 2018	Irish Court Service, BirdWatch Ireland (BWI) Westmeath Branch, BAM Construction (main contractor)
Caller System Used	No. of Nest Sites Created	Year Initiated
Yes – under licence	12	2018

Project Summary

Seven active Swift nests were identified at Mullingar Court House during the 2015 Mullingar Swift Survey carried out by the BirdWatch Ireland Westmeath Branch. In 2016 the building was to undergo significant restoration and development work which would result in the loss of the existing Swift nest sites. The BirdWatch Ireland local branch and local NPWS Ranger persuaded the architects and contractors to install Swift nest boxes to mitigate the loss of the existing nest sites. Over a two-year period, the partners worked closely together to ensure the boxes and caller system were correctly installed to attract the needs of nesting Swifts and to protect the appearance and integrity of this heritage building. Six additional nest sites and a caller system were installed in local authority-owned buildings nearby to provide Swift nest sites during the construction works to mitigate the impact on locally nesting Swifts.



Swift boxes at Dermot Doran's house in Johnstown, Co. Kildare



Swifts in nest box



Dermot Doran's House

Location	Project Coordinator(s)	Building Type
Johnstown Bridge, Co. Kildare	Dermot Doran	–
Nest Types	Swifts Occupying	Project Partners
Integrated and externally fitted	Yes – four pairs to date (August 2018)	–
Caller System Used	No. of Nest Sites Created	Year Initiated
Yes – under licence	16	2014

Project Summary

In June 2014 Dermot installed three Zeist-type externally fitted nest boxes to an east-facing wall of his home in north Kildare. Anecdotally, Dermot had never observed Swifts near the house. Three more nest boxes were installed on a north-facing wall the following March (2015). During June 2016, Swifts were observed over the house and by July a pair had taken up residence in one of the east-facing facing boxes. In January 2017 Dermot, with help from BirdWatch Ireland Kildare Branch members, installed one triple and one double-cavity nest boxes on the wall of his home. That summer, the original pair returned and successfully fledged two young while another pair took up residence in a north-facing box. Dermot installed five new Zeist boxes in 2018 and the two established pairs returned to successfully rear young. Two new pairs also took up residence in the north-facing boxes.





Swift boxes and interpretation panel at St. Rynagh's National School, Banagher, Co. Offaly

St. Rynagh's National School, Banagher

Location	Project Coordinator(s)	Project Advisors
Main Street, Banagher, Co. Offaly	Banagher Tidy Towns	BirdWatch Ireland and National Parks & Wildlife Service
Nest Types	Swifts Occupying	Project Partners
Externally fitted – Triple-cavity "T7A" Schwegler Nest Boxes x 2	Yes (a Swift observed entering a nest box in 2018 but it is unlikely they are breeding there yet)	The Heritage Council, St. Rynagh's N.S.
Caller System Used	No. of Nest Sites Created and Maintained	Year Initiated
Yes – under licence	Six	2015

Project Summary

A community conservation project carried out by the local Tidy Towns group for the National Tidy Towns competition category "Wildlife, Habitats and Natural Amenities". The project's aims are to conserve Swifts and raise awareness of their conservation significance with local schoolchildren. The schoolchildren have been taught how to identify Swifts and they have contributed Swift artwork that has been incorporated into promotional posters that the Tidy Towns group uses to raise awareness of the project locally. This is a new nesting colony site for Swifts and it is hoped that creating new nest sites will mitigate potential nest site losses due to future building renovations nearby. An interpretative panel on Swift ecology, conservation and local projects was also installed on the street outside the school.

Useful links

General Swift information

BirdWatch Ireland

www.birdwatchireland.ie

British Trust for Ornithology

www.bto.org/about-birds/birdfacts/bird-families/swifts

Birdlife International

www.datazone.birdlife.org/species/factsheet/common-Swift-apus-apus

Information on setting up Swift nesting sites and caller systems

Swift Conservation Ireland www.swiftconservation.ie

Northern Ireland Swift Group www.saveourswifts.co.uk

Swift Conservation UK www.swift-conservation.org

Live (seasonal) Swift cams

GMIT Swift Nest Cameras (active May to September each year):

www.swiftconservation.ie/gmit-swiftcams

Rehabilitating Swifts

Wildlife rescue useful contacts: www.irishwildlifematters.ie/animals/contacts.html

Recording Swift sightings/nest sites

National Biodiversity Data Centre www.biodiversityireland.ie

Helpful videos

Confusion species www.youtube.com/watch?v=klya9oEK57M

BirdWatch Ireland video 'Ireland's Special Swifts'

www.youtube.com/watch?v=Z5YzYJcJWfM

Maiden Tower, Baku, Azerbaijan

www.youtube.com/watch?time_continue=5&v=yLm0c3sDA9g

Reporting wildlife crime

National Parks and Wildlife Service www.npws.ie/contact-us

Swift groups

A number of voluntary organisations have been working on Swift conservation in Ireland for almost 20 years.

Name	Northern Ireland Swift Group
Founded	2000
Activities undertaken	The Northern Ireland Swift Group acts as an advisory body advising individuals, organisations, grant-aiding bodies, businesses, local and central government on how to save existing Swift nest sites or create new nest sites in new and existing buildings.
Email	enquiries@saveourSwifts.co.uk
Web	www.saveourswifts.co.uk



Name	Swift Conservation Ireland
Founded	2013
Activities undertaken	Swift Conservation Ireland (SCI) has coordinated and advised on over 60 projects to date. The primary purpose of SCI is to bring together people interested in helping Swifts and to provide guidance and assistance in best practice when setting up nest box projects. In addition, they carry out education survey training and advocacy work promoting Swift conservation across the country. From May to August each year, SCI broadcasts a 24-hour live-stream from inside their Swift nest boxes at GMIT Mayo Campus in Castlebar. The activities of the Swifts are enjoyed by a large audience each year. The SCI website provides information and guidance on all aspects of Swift conservation.
Email	Swiftconservationireland@gmail.com
Web	www.swiftconservation.ie



Name	Dublin Swift Conservation Group
Founded	2013
Activities undertaken	Dublin Swift Conservation Group's core work is in delivering Swift conservation and educational programmes. Talks and events for schools and community groups are delivered throughout Dublin with the help of the groups Patron and well-known Ornithologist Eric Dempsey. A large part of their work is in the installation of Swift nest boxes at schools and public housing schemes as well as in public building developments. Members of the group give advice on handling grounded and injured Swifts to members of the public. The group also conducts Swift nesting surveys and lead guided walks to observe Swifts and view Swift nest colonies.
Email	helendixieburke@gmail.com



About BirdWatch Ireland

BirdWatch Ireland is the largest independent conservation organisation in Ireland. Established in 1968, it currently has over 15,000 members and supporters and a local network of over 25 branches nationwide.

The primary objective of **BirdWatch Ireland** is the protection of wild birds and their habitats in Ireland. To fulfil these objectives, we:

- Carry out extensive research and survey work.
- Operate conservation projects for some of Ireland's most threatened bird species and habitats.
- Manage a network of nature reserves nationwide.
- Advocate for the conservation of wild birds, their habitats and other biodiversity nationally and internationally.
- Recruit, retain and service a growing membership base.
- Build on existing partnerships with other non-governmental environmental organisations, with Government departments, the European Commission and farming organisations, and to establish new partnerships with other sectors.
- Raise awareness and promote the value and importance of wild birds and biodiversity through field education, dedicated media and to the national media.'

There are lots of ways to get involved with **BirdWatch Ireland** so that you can enjoy Ireland's wild birds and help us to protect birds and biodiversity.

To join **BirdWatch Ireland** as an individual, family, school or key member, contact us at www.birdwatchireland.ie or call us (01) 281 9878.

An Chomhairle Oidhreachta
The Heritage Council



Local Authority Heritage Officers work within most local authorities across Ireland. With the support of the Heritage Council, Heritage Officers play a key role in promoting heritage awareness, developing policy and providing advice and information on local as well as national heritage issues.

To contact your local Heritage Officer, see www.heritagecouncil.ie/our-work-with-others/county-heritage-officers





BirdWatch Ireland

Unit 20 | Block D | Bullford Business Campus | Kilcoole | Greystones | Co. Wicklow A63 RW83

Tel: +353 (0)1 281 9878 Email: info@birdwatchireland.ie