FIFTH INTERNATIONAL SWIFT CONFERENCE

RUTH DANIEL RESIDENCE, TEL AVIV-JAFFA, ISRAEL

MARCH 11TH - 16TH 2018

Schiff House in Tel Aviv, a heritage site with nesting swifts
Illustration: Tuvia Kurtz

Society for the Protection of Nature in Israel
החברה להגנת הטבע
Israel Ornithological Center

The Hoopoe Foundation
Society for the Protection of Nature

ידידי הסיסים ע"ר
FRIENDS OF THE SWIFTS R.A.

TEL AVIV UNIVERSITY
אוניברסיטת תל אביב

המשרד לשיתוף פעולה אזורי
وزارة التعاون الاقليمي
The Ministry of Regional Cooperation

TEL AVIV YAFO
תל אביב יפו

אוניברסיטת חיפה
University of Haifa

Swift flying over the Western Wall and Al-Aqsa Mosque in the Old City of Jerusalem
Photo from a drone: Yuval Dax

"YEA, THE STORK IN THE HEAVEN KNOWETH HER APPOINTED TIMES; AND THE TURTLE AND THE CRANE AND THE SWIFT OBSERVE THE TIME OF THEIR COMING" (JEREMIAH 8:7)

THE SWIFT - A "FLAG SPECIES"
Israel, paradise for swifts and swift lovers 📷 Photo Amir Ezer

The booklet was edited by: Sorrel Ritter, Yossi Leshem and Amnonn Hahn

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Swift drinking while flying above water
Marc Guyt / www.agami.nl

WELCOME TO THE FIFTH INTERNATIONAL SWIFT CONFERENCE!

When Ulrich Tigges held his first “Commonswift Seminars” back in Berlin in 2010, I don’t think that either he or any of us who were there at the time had any idea that his dream would go on to become a regular international event, gathering Swift enthusiasts, scientists and ornithologists from around the Planet to discuss and share their information and experiences about their favourite bird.

Here we are together again! And this time out of Western Europe for the first time studying “our” bird at the fringes of its Mediterranean distribution and hopefully well beyond too. Of course we’ll be looking at the other Swifts of the World as well, something that just gets more interesting with every conference we hold.

A lot has happened in the world of Swifts over the last two years; these conferences have brought Swift enthusiasts together, not just for a short conference but for all time. The result is that we have been co-operating on a host of projects, sharing ideas, teaching, training, sharing information and conducting research.

The results have been amazing. In almost every country represented at our conferences there is now a highly active Swift group, or even several of them, integrated with those in other countries, and all working to keep Swifts flying in our skies, and in our grand-children's skies too, in fact, forever!

Our hope is that this conference will, just like the ones before, propel the study and conservation of Swifts ever further, until we can see their populations revive, their reputation as a bringer of urban biodiversity, drama, charm and beauty, as well as shared ecological values, grow until everyone knows something good about Swifts, and values their presence in and above our dwellings.

We hope you have a splendid conference, that you will find the talks fascinating and useful, that you will enjoy discovering new Swift sites, seeing new Swift populations and making new friends during your time here, and most of all, that you leave filled with the ardour to help Swifts survive and thrive!

Warm thanks to all those who assisted in the organization of the conference, and to our partners hosting the conference in Israel: to the Society for the Protection of Nature in Israel (SPNI) and especially the Hoopoe Foundation which contributed most of the funds towards the conference and its Chairman Maj. Gen. (Res.) Doron Almog; to the Ministry of Regional Cooperation – Minister of Regional Cooperation MK Tzachi Hanegbi, Director-General Dr. Joseph Draznin and Deputy Director-General Ambassador Yael Rubinstein; to the Tel Aviv Municipality – Mayor of Tel Aviv-Jaffa Mr. Ron Huldai who with boundless energy is turning Tel Aviv into a global city and appreciates the contribution of the swifts to the city ambience, to Chairman of Tel Aviv Global Maj. Gen. (Res.) Noam Tibon and General-Director of Tel Aviv Global Eytan Schwartz who helped with the conference together with Head of the Environmental Authority Eitan Ben Ami; to the Friends Of The Swifts Association (FOTS) whose work with the swifts in Israel and in education is tireless and admirable; to Jordan and the Palestinian Authority who in the near future will use swifts to build ties between countries in the Middle East; to IDF Chief of the General Staff Lt. General Gadi Eisenkot thanks to whom we have succeeded in converting ammunition cases to nesting boxes for swifts and realizing the modern day version of the prophet Isaiah "They will beat their swords into plowshares and their spears into pruning hooks" (Isaiah 2:4).

Edward Mayer, on behalf of the conference organizing committee:

Amnonn Hahn, Dan Alon, Edward Mayer, Dr. Nir Sapir, Dr. Mauro Ferri, Sorrel Ritter, Prof. Yossi Leshem

Alpine Swift nestlings in the Mauerseglerklinik, Frankfurt Photo: Christiane Haupt

Swifts in flight Illustration: Tuvia Kurtz

PROGRAM & CONFERENCE DETAILS

Ulrich Tigges at the First International Swift Conference in Berlin in 2010 Photo: Amnonn Hahn

Dr Jane Goodall with Martine Wauters (left) and two members of the Brussels Swift group demonstrating the importance of having VIPs involved in raising awareness among the public

At the Fourth International Swift Conference in 2016 at Szczecin, Poland, it was decided to hold the Fifth International Swift Conference in Tel Aviv, Israel. This is the first time the conference will be held outside Europe and we are very proud to have received this opportunity to host it, and expand the discussion beyond the European borders by inviting lecturers and participants from Jordan and the Palestinian Authority.

We hope to use the swifts as messengers of peace to expand regional cooperation and as you surely would agree, they are the perfect candidates!

We are sure that besides the interesting lectures, you will have a unique and unforgettable experience visiting our small country, rich with many swift and bird species. 540 bird species can be observed in Israel, and 500 million birds migrate over the country twice a year – March is the peak of the migration season.

VENUE & HOTEL DETAILS

CONFERENCE HOTEL

Ruth Daniel Residence located in Jaffa close to the Old City and tourist sites (http://www.mishkenot-jaffa.co.il/).

CONFERENCE COMMITTEE

- **Amnonn Hahn** – Director, The Friends Of The Swifts Association (FOTS)
- **Dan Alon** – Director, Israel Ornithological Center (IOC), Society for the Protection of Nature in Israel (SPNI)
- **Edward Mayer** – Swift Conservation, UK
- **Dr. Nir Sapir** – University of Haifa
- **Dr. Mauro Ferri** – Italy
- **Sorrel Ritter** – Conference coordinator, SPNI
- **Prof. Yossi Leshem** – Tel Aviv University; Secretary, Hoopoe Foundation, SPNI

Swifts and contraills - Elba, Italy - 5 June 2014 Lothar Schiffler

Since birds don't leave contrails behind, Lothar Schiffler uses a kind of reversed longtime exposure during daytime. The images of thousands of HD or 4K video frames are combined with the help of a special algorithm to visualize the trajectory of a birds flight. This process adds only the dark picture elements, therefore Schiffler calls it "iskiography", from Greek iskios = shadow.

PROGRAM
SUNDAY, MARCH 11TH 2018

16:00 – 19:00 **Registration**

19:30 – 21:30 Evening get together festive dinner at **Ruth Daniel Residence** with the **Bernie Marinbach klezmer trio** (Jewish folk music)

Greetings:

Prof. Yossi Leshem and **Amnonn Hahn** - a welcoming toast to our respected guests on behalf of the conference committee

Gen. Mansour Abu Rashid (Jordan) and **Gen. Baruch Spiegel** (Israel), the two generals who engineered the Peace Treaty between Jordan and Israel in 1994

Ambassador Yael Rubinstein, Deputy Director General, The Ministry of Regional Cooperation

MONDAY, MARCH 12TH 2018

09:00 – 09:30 **Greetings:**

Ron Huldai – Mayor of Tel Aviv-Jaffa

Dr. Jane Goodall – recorded greeting

Dr. Joseph Draznin – Director-General of the Ministry of Regional Cooperation

Maj. Gen. (Res.) Noam Tibon – Chairman of Tel Aviv Global

Iris Hann – CEO of the Society for the Protection of Nature in Israel (SPNI)

Edward Mayer – Swift Conservation, UK

FIRST SESSION – CHAIRPERSON: MAURO FERRI

09:30 – 10:00	**Christoph Meier** – Migratory schedule of different Alpine Swifts
10:00 – 10:30	**Dick Newell** – What do we know about Swift Nest Boxes?
10:30 – 11:00	**Coffee break**
11:00 – 11:20	**Mark Smyth** – A walk on the Wildside – A look at Swift nesting sites in the natural landscape
11:20 – 11:40	**Brian Cahalane** – Swifts in Ireland
11:40 – 12:00	**Ninon Ballerstadt** – Swifts' sleeping behavior
12:00 – 12:20	**Judith Wakelam** – 15 years of rehabilitating Swifts in my home
12:20 – 12:40	**Edward Mayer** – A new Swift Column for the modern built environment
12:40 – 13:10	**Peter Cush** – An overview of Apus apus & Apus apus pekinensis
13:15 – 14:15	**Lunch break**

Close-up of swifts from the Tree of Hope Photo: Baruch Gian

Swifts eating in flight Illustration: Haim Moyal

SECOND SESSION – CHAIRPERSON: EDWARD MAYER

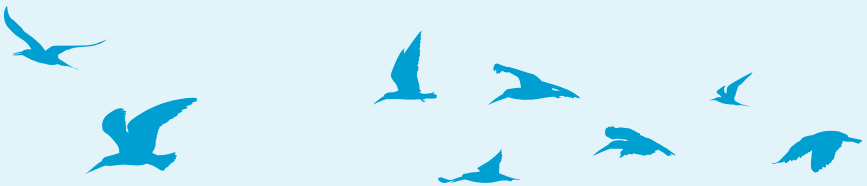
14:45 – 15:05	**Mark Coreth** – The Tree of Hope – A Swift Project
15:05 – 15:25	**Alexandru Stahl** – Mauerseglerklinik Frankfurt: Mastering Swift rehabilitation
15:25 – 15:45	**Marco Cucco** – Citizen-Science: Swift Conservation in Italy
15:45 – 16:05	**Ikram Quttaineh** – Mahmiyat.ps website: Environmental awareness from the virtual world to the real world
16:05– 16:35	**Coffee break**
16:35 – 16:55	**Katja Schmieder** – "The coolest bird": cultural differences between European and American Swifts
16:55 – 17:15	**Itai Bloch & Nir Sapir** – Insights from ATLAS tracking of foraging Little swifts in the Hula Valley, Israel
17:15 – 18:15	**Poster Session**
18:30 – 19:30	**Dinner**
19:30 – 22:00	**Guided tour of Jaffa's Old City**

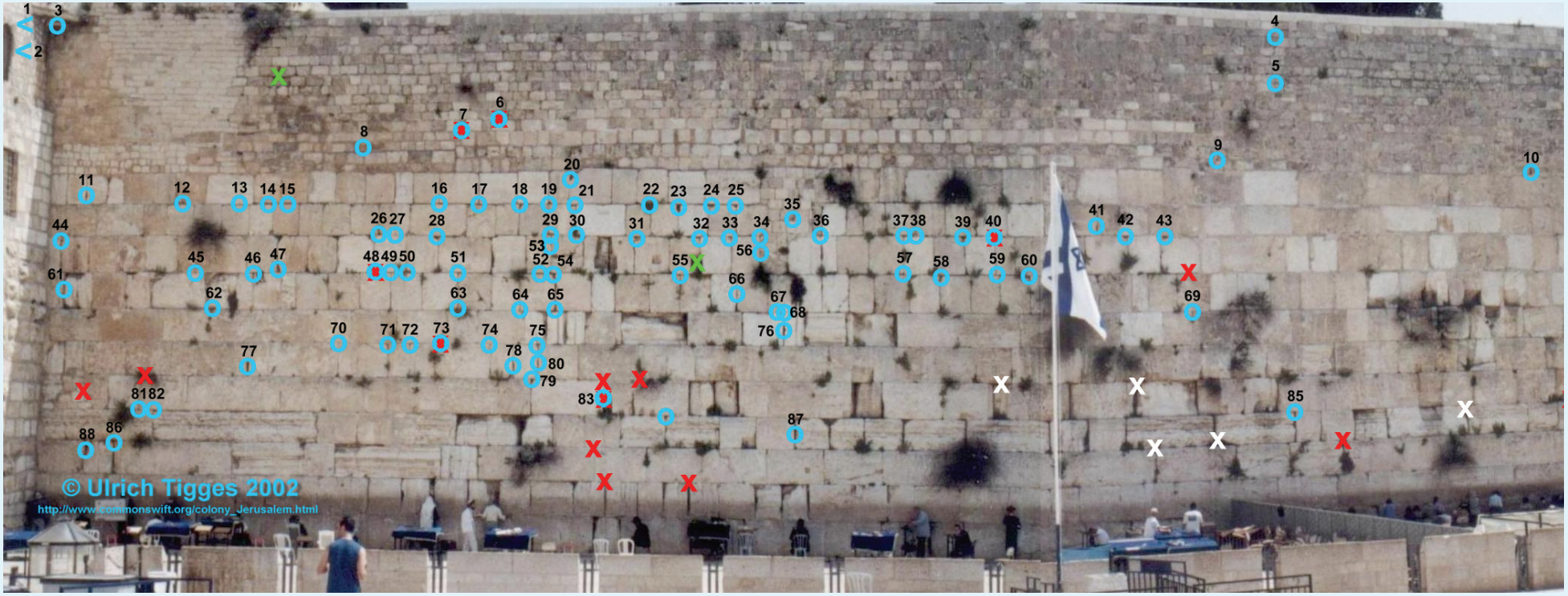
TUESDAY, MARCH 13TH 2018

06:00	Early morning birding tour before breakfast [optional]
07:00 – 08:30	**Breakfast**

THIRD SESSION – CHAIRPERSON: SORREL RITTER

09:00 – 09:30	**Yossi Leshem & Amnonn Hahn** – A Swift Way to Peace
09:30 – 10:00	**Lynda Huxley** (presented on behalf of **Chris Huxley**) – Some aspects of the breeding biology of the swifts of County Mayo, Ireland
10:00 – 10:20	**Gen. (Ret.) Mansour Abu Rashid** – From an army general to a peacemaker
10:20 – 10:50	**Coffee break**
10:50 – 11:10	**Melpo Apostolidou** – Helping Swifts in Cyprus
11:10 – 11:30	**Lukas Viktora** – Does it really work? A study in the Czech Republic
11:30 – 11:50	**Diane Yorgason-Quinn** (presented on behalf of **Larry Schwitters**) – Audubon's "Vaux's Happening" Project
11:50 – 12:10	**Parcharidou Effrosyni** – Swift friendly buildings in Thessaloniki, Greece
12:10 – 12:30	**Stefano Pesaro** – A multi-facetted approach to Swift conservation in Italy
12:30 – 12:50	**Lothar Schiffle**r – Airlines: Bird Tracks in the air
12:50 – 13:50	**Lunch break**
14:00 – 19:00	Swift tour in Tel Aviv to include: (1) Swift "Living Wall" at Katzenelson School (2) IDF Headquarters to learn about the Nature Defense Forces and their connection to Swifts and heritage sites (3) Visit to see the nesting boxes at the Israel Electric Corporation (IEC) Directorate building
19:30	**Free evening in Tel Aviv-Jaffa**





Map of swift nesting sites in the Western Wall, the Old City of Jerusalem, the holiest Jewish site Ulrich Tigges 2002

WEDNESDAY, MARCH 14TH 2018

06:00 – 06:30 **Breakfast at hotel before departure**

06:30 – 23:00 Tour to Jerusalem and the Dead Sea:

- Jerusalem Bird Observatory – ringing station in the Israeli Parliament grounds
- Wadi Kelt (a gorge in the Judean Desert between Jerusalem and Jericho), observation point over the desert to see three Swift species (Alpine, Little and Pallid Swifts), and with luck migration of soaring birds
- Southern Dead Sea observation of Pallid Swifts colony (Zohar Reservoir)
- St. John of Jerusalem Eye Hospital, the Christian Quarter to see and hear about the **Tree of Hope**, an olive tree Swift sculpture
- Watching swifts at the Western Wall in the Old City of Jerusalem
- Beautiful view from the Mount of Olives over the Old City and eastern dinner at the 7 Arches Hotel (http://7arches.com/new/progress/)

Greetings:

Prof. Mike Turner (former Chairman of UNESCO Israel) - The Swifts, where culture and nature meet

Naomi Tsur – Founder and Chair of the Jerusalem Green Fund

Swift in the Western Wall in the Old City of Jerusalem
Photo: Flash 90

Rabbi of the Western Wall, Rabbi Shmuel Rabinowitz, welcomes the swifts back to Jerusalem every year at the annual ceremony
Photo: Amnonn Hahn

Jerusalem Mayor Nir Barkat welcomes the swifts back to Jerusalem at the annual ceremony
Photo: Ilan Goldstein

THURSDAY, MARCH 15TH 2018

07:00 – 08:30	**Breakfast**

FOURTH SESSION – CHAIRPERSON: AMNONN HAHN

08:45 – 09:05	**Gert de Jong** – How to conduct a census of Swifts in a city like Amsterdam, The Netherlands
09:05 – 09:25	**Mauro Ferri** – Artificial Swift nests from Medieval period up to modern times
09:25 – 09:45	**Kevin Prince** – X-ray fluorescence study of Swifts' feathers
09:45 – 10:05	**Francisco Javier Saez Frayssinet** – The protection of Apus Apus in Segovia, Spain
10:05 – 10:25	**Thomas Starkmann** – Common Swift nesting sites conservation in Vienna
10:25 – 11:05	**Coffee break**

FIFTH SESSION - CONFERENCE COMMITTEE

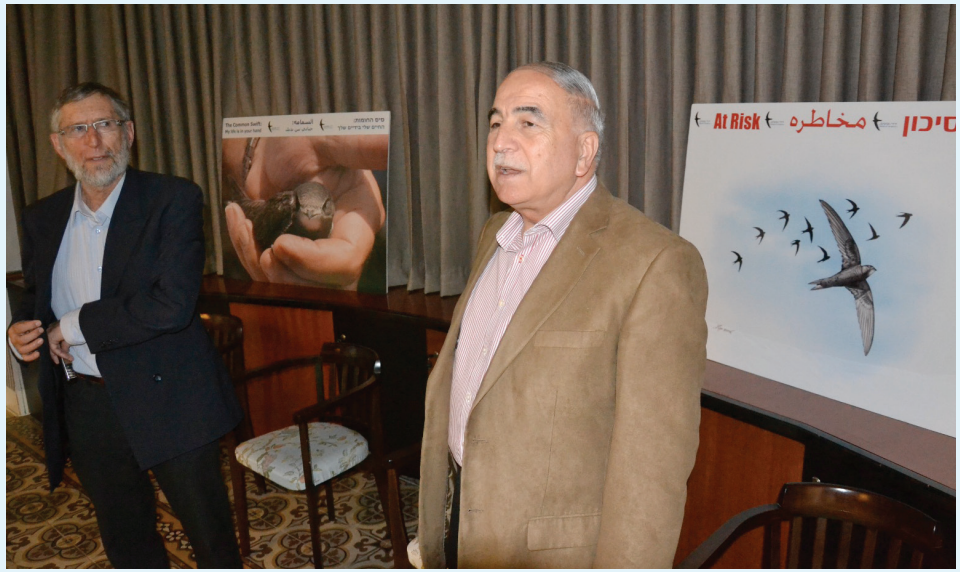
11:05 – 13:00	Open discussion including future action plans and voting for the 2020 International Conference location
13:00 – 14:00	**Lunch**
14:00	**Free afternoon & evening in Tel Aviv-Jaffa**

FRIDAY, MARCH 16TH 2018

06:00 – 06:30	**Breakfast at hotel before departure**
06:30	Tour to see the Griffon Vultures in Mt. Carmel and Little Swifts nesting in the Hula Valley in north Israel, as well as many more local and migrating birds

SATURDAY-TUESDAY, MARCH 17TH-20TH 2018

04:30	**Early morning wakeup & taking breakfast boxes from hotel**
05:00	Departure on 4-day tour (3 nights) from Tel Aviv via the Negev to Eilat to view the amazing bird migration as part of the Eilat 2018 International Spring Migration Festival; accommodation at Eilat's excellent Agamim hotel



May 2012: Joint seminar with the Israelis, Palestinians and Jordanians at Schiff House – regional cooperation using Swifts who nest in the Church of the Nativity, Mosque in Amman and Jerusalem's Wailing Wall to bring nations and religions together; on the left (center): General (Ret.) Mansour Abu Rashid, Chairman of the Amman Center for Peace and Development (ACPD), Jordan Photo: Amnonn Hahn

POSTERS

Swifts - Piazza Maggiore, Bologna, Italy - 14 April 2014 Photo: Lothar Schiffler

Alain Paquet — Common swifts survey in Brussels

Deborah Fandos Fernández, Fina Galindo López, Enrique Luque López & Elena Muñóz López — Restoration of a Common Swift (Apus apus; L., 1758) Colony with Bird Houses in Benicarló, Castellón (Spain)

Edward Mayer — The Swift Conservation & Habi-Sabi Swift & Bat Column- a new concept for urban biodiversity enhancement

Elena Abdullaeva — Uzbekistan - owner of Rehabilitation Centre of Wild Birds

Elena Muñoz — Preservation of an Alpine Swift (Tachymarptis melba) Colony on Sant Fruitós Del Bages' Emblematic Construction in Catalonia, Spain

Ian Enlander — Rapid high density visible migration movement of Common Swift Apus apus at Salobreña, southern Andalucia, Spain, August 2009

Kasia Szczypa — Is vitamin B deficiency adding to the challenges confronted with hand rearing of Common swift (Apus apus)?

Kevin Prince — Elemental distribution in feathers of the Common Swift (Apus apus), a PIXE, hard x-ray and soft x-ray fluorescence study

Martine Wauters — Swifts Without Frontiers

Ninon Ballerstädt — The private swift rehabilitation center in Tutzing

Roots&Shoots Tanzania and Swifts Without Frontiers — Swift Protection in Tanzania: A Promising Partnership for a A Challenging Pilot Project

LECTURE ABSTRACTS

[IN ALPHABETICAL ORDER BY FAMILY NAME]

HELPING SWIFTS IN CYPRUS

Melpo Apostolidou
melpo.apostolidou@birdlifecyprus.org.cy

Cyprus hosts three species of Swifts and all of them are summer breeding visitors. The Common Swift *Apus Apus* with the most up-to-date population estimated at 15,000 – 60,000 pairs, the Alpine Swift *Tachymarptis melba* with the most up-to-date population estimated at 200 – 500 pairs and the Pallid Swift *Apus pallidus* with the most up-to-date population estimated at 200 – 1000 pairs. These Swift species arrive in Cyprus around March and leave in late July, though we then get passage migrants until September.

Town Hall in Aradippou, Cyprus, whose emblem is a bird under which a row of nesting boxes for swifts have been installed
Photo: Elena Markitani

Swifts are amazing creatures and going beyond their unique biological and behavioural characteristics they can also be a great awareness raising tool for conservation issues especially because the Common Swift spends its breeding period so close to humans.

In 2015, BirdLife Cyprus in collaboration with SPNI (BirdLife Israel) started a one-year pilot project aiming to embrace a sustainable educational and awareness raising project using the Swift nest boxes to make a change in the public awareness. At the same time the project aimed at helping the Common Swift by creating new nesting spaces and helping maintain existing nests.

The project was implemented with funding from the Tasso Leventis Conservation Foundation and the main activities in Cyprus included installation of nest boxes in Community buildings and schools as well as awareness raising activities for the public and also for government officials from relevant departments and professionals working in old building renovations and building regulations. The project also gave the opportunity for exchanging experience and best examples between SPNI and BirdLife Cyprus.
This pilot project paved the way for more conservation and awareness raising work with the Common Swifts as new collaborations have been established thanks to this project.

WHAT ARE SWIFT NESTLINGS DOING DURING SLEEPING TIME?

Ninon Ballerstädt
ballerstaedt@orn.mpg.de

Until recently it was not possible to obtain EEG (electroencephalogram) recordings of a swift in the air at night to find out if, and how, they are “sleeping”. Therefore, I decided to observe swift nestlings at my private rehabilitation centre.

Throughout many years working with young swifts and other birds (especially song birds) it became obvious to me, that even swift nestlings don’t behave like other birds. At night, when the lights are switched off, the cages covered by blankets and it is getting quiet, all the none-swifts calm down and fall asleep, turning their heads to the back and hiding it in the plumage. But the swift nestlings keep on with cheeping and “chatting”. It’s not very loud and it doesn’t disturb the sleep of the others, but

Bolus, a "ball" of food the swift carries back to its chicks in the nest
Photo: Klaus Roggel

Common Swift flying to its nest with its throat swollen by a bolus of about 1,500 insects for its hungry nestlings
Photo: David Moreton

you can hear them all night long. When they grow bigger and start to leave their nests you will also hear the sounds of scratching, walking around and flapping of wings.

Therefore, I borrowed an IR-camera from one of the research groups at the Max-Planck-Institute for Ornithology (MPIO) and installed it in one of my boxes containing usually three swift nestlings. The camera was running for 24 hours a day for about one month.

I analysed the recording of one 24-hour-period: At the beginning of every minute I wrote down the behaviour of each swift.

I built up a scale of five different types of behaviour with increasing activity:

1. Doing nothing
2. Looking around
3. Preening and scratching
4. Walking around
5. Doing “pushups” with strong wing flapping

Afterwards I analysed the percentage of these five types of activity and compared it during day- and night-time. The results are shown in pie charts and there are no obvious differences in activity between day and night in all three recorded swifts.

USING AN ADVANCED TRACKING SYSTEM FOR UNDERSTANDING THE MOVEMENT AND BREEDING ECOLOGY OF THE LITTLE SWIFT (APUS AFFINIS)

Itai Bloch* & Nir Sapir - Department of Evolutionary and Environmental Biology, University of Haifa**

* Itaibloch2@gmail.com

** nirs@sci.haifa.ac.il

Movement is a significant component in the biology of almost all the organisms in the world. An important objective of animal movement ecology is to understand how different biotic and abiotic factors, such as physical conditions, genetic characteristics, and environmental conditions, affect animal movement. Environmental influences on animal movement may occur at different scales in time and space and include, for example, the impact of local topography on the flight of gliding birds, the influence of wind on migratory birds crossing large waterbodies and the implications of global warming on the timing of migration of a wide variety of species. An important question in bird ecology and behavior is the relationship between parental care division and movement during the breeding season. In species that exhibit distinct sexual dimorphism, there is usually a clear division of the parental roles during breeding, whereas in species that exhibit sexual monomorphism, there

Swifts mating during flight 📷 Photo: Amir Ben Dov

is generally little or no divergence in the parental roles. However, some studies have shown that there are differences in parental roles also in sexually monomorphic species, e.g., in the frequency, timing and duration of nest visits and in foraging ranges. In this study, we examine the characteristics of the movement of the Little swift *(Apus affinis)*, a sexually monomorphic bird species, with regard to the sex and the nesting stage. For this study we used the ATLAS system (Advanced Tracking and Localization of Animals in real-life Systems). The ATLAS is a reverse-GPS wildlife tracking system that enables high resolution analysis of movement in time and space in the Hula Valley region, northern Israel. During the experiment, we examined the utilization of daylight hours in relation to the progression of the breeding season by examining the entry and exit times from the nest for the night. We examined the foraging ranges and the visits' frequency in relation to the different hours of the day and the swifts' favorable foraging areas. In addition, we examined the differences between sexes in the aforementioned characteristics.

SWIFTS IN IRELAND

Brian Cahalane

bbrian59@aol.com

The talk will consider how the Common swift, coming from nearly 8 months in Africa, adapts for 4 months of the year to the wet, windy and cool climate of Ireland and succeeds in this while rearing up to 3 chicks.

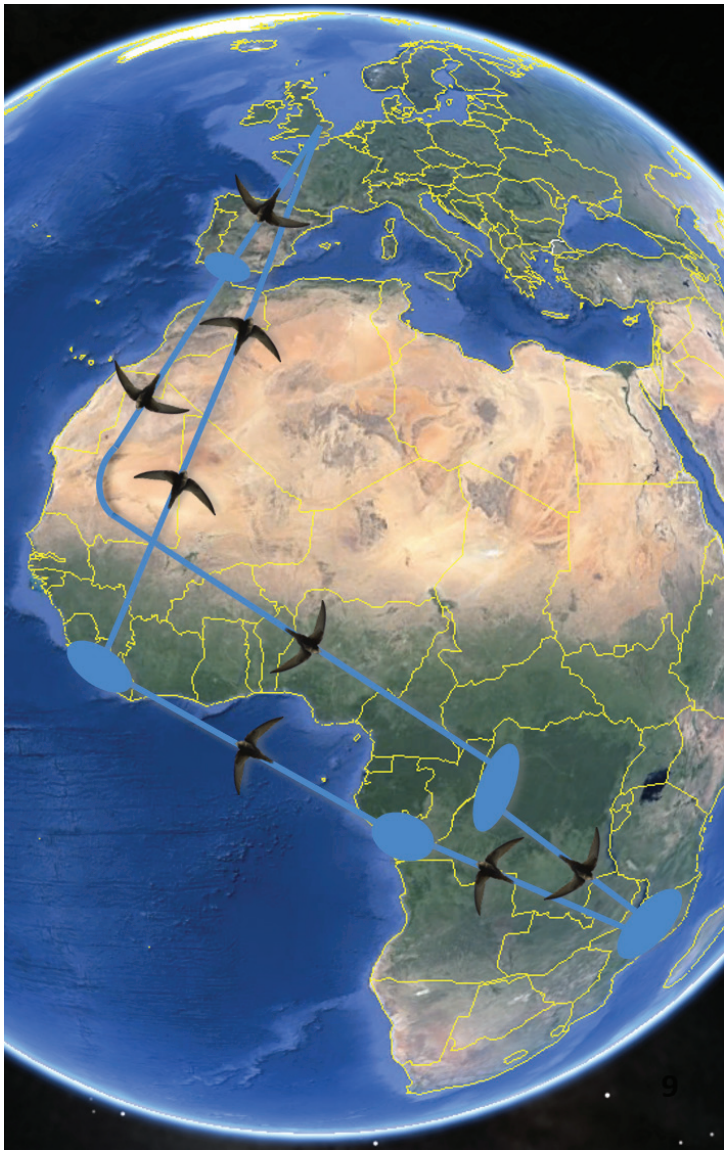
Ireland (the Emerald Isle) will be looked at from the standpoint of just how many water bodies there are, from the thousands of lakes to the rivers, streams, bogs and ponds that exist. This will be related to the habitat requirements and feeding strategies of swifts in Ireland ranging from the drier south-east coast to the more wet and windy Atlantic west coast. County Mayo will be used as an example of how habitat and suitable nest site availability combines to determine the numbers of breeding swifts found there.

Irish swifts are living on one island and travel freely from north to south without consideration for a political border. The main negative impact on the swift breeding population in both jurisdictions in Ireland has been the political and financial administration of the economy and wildlife conservation. In particular, the impact of the **"Celtic Tiger"** years in Southern Ireland and a similar property boom/bubble in Northern Ireland leading up to the financial crash of 2007 will be discussed in the context of their major impacts on the Common swift breeding population by reducing nest site availability.

Limited local tracking of Irish breeding swifts using GPS during the nesting season and interpretation of the results will be reported on. Migration routes and destinations in Africa revealed by both GPS and Geologgers will be reported on.

The swift populations in the far west Counties of Mayo and Galway will be reported on as examples of what factors determine the overall breeding success and distribution of the swift in Ireland.

The presentation will conclude by showing examples of how close collaboration and sharing of expertise across the island of Ireland is resulting in positive conservation efforts for *Apus apus.*



Migration route of 22,500 km of a Common Swift from Cambridge, England to Africa and back

TREE OF HOPE – THE SWIFT'S PROJECT

Mark Coreth
mark@markcoreth.com

INTRO

Who am I as a sculptor and what is my working method. I shall give a thumb nail sketch of my travels around the world to study and sculpt wildlife and its environment.

THE MURISTAN COMMISSION

The Tree of Hope, the Swifts' project started as a commission to decorate the garden space in Muristan that belongs to the Order of St John and has turned into a philanthropic piece of work calling for respect, understanding and close co operation between the Abrahamic Faiths.

I was asked by the St John of Jerusalem Eye Hospital Group, to create a piece of sculpture to go into their garden in Muristan, in the Old City of Jerusalem. It had to tell of the history of the city and to give a message of HOPE to the Middle East and the world in general.

Muristan is located in the Old City of Jerusalem where the four Quarters of the City meet... A brief history of the site and the importance of the location to the Abrahamic Faiths.

To tackle the mission of telling the history of Jerusalem and its people and to give a message of HOPE I had to visit the Holy Land and try to get a personal understanding by seeing for myself and talking to people.

How I found the inspiration to create the work... from a blank sheet of paper to a finished sculpture in 10 Months. The Olive Tree and the Swifts... The Tree symbolising the walls of Jerusalem and the swifts the dynamic movement of people...how and why...?

How the sculpture expands way beyond the garden in Muristan, how it becomes global... a message of HOPE.

Nesting boxes as an intricate and important part of the bronze sculpture.

Looking to how the Swifts' Project can expand into the future.

THE SWIFT *APUS APUS* AND *APUS APUS PEKINENSIS* - AN OVERVIEW

Peter Cush
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This talk will present an overview of what we know about the species in 2018, what remains to be known and what we need to do to conserve and enhance populations for future generations. Apodidae evolution will be briefly outlined. Apus apus and Apus apus pekinensis as a species will be

described. The distribution, habitat requirements, feeding, longevity, migration and life strategies of Apus apus will be outlined. Flight muscle characteristics, torpor and some other specialist adaptations will be described.

A brief comparison with the passerine hurindines will highlight the uniqueness of the species. The crucially important first flight of the fledging will be examined. Nest site selection will be outlined in the context of social interactions around a colony by breeding and immature birds as the breeding season progresses.

Migration arrival and departure times will be discussed. General migration routes will be outlined with a few up to date details given on the migration routes of breeding birds from some swift populations. An examination will be undertaken of what we still don't know about the species which might be important in trying to conserve it more effectively. The role of the swift as a possible indicator of environmental change will be discussed.

Causes of declines in populations will be discussed particularly wholesale losses of nesting opportunities in some areas and how this might be exacerbated by the biological strategies used by the species to establish themselves in new areas and by how immature birds seek and choose new nest sites.

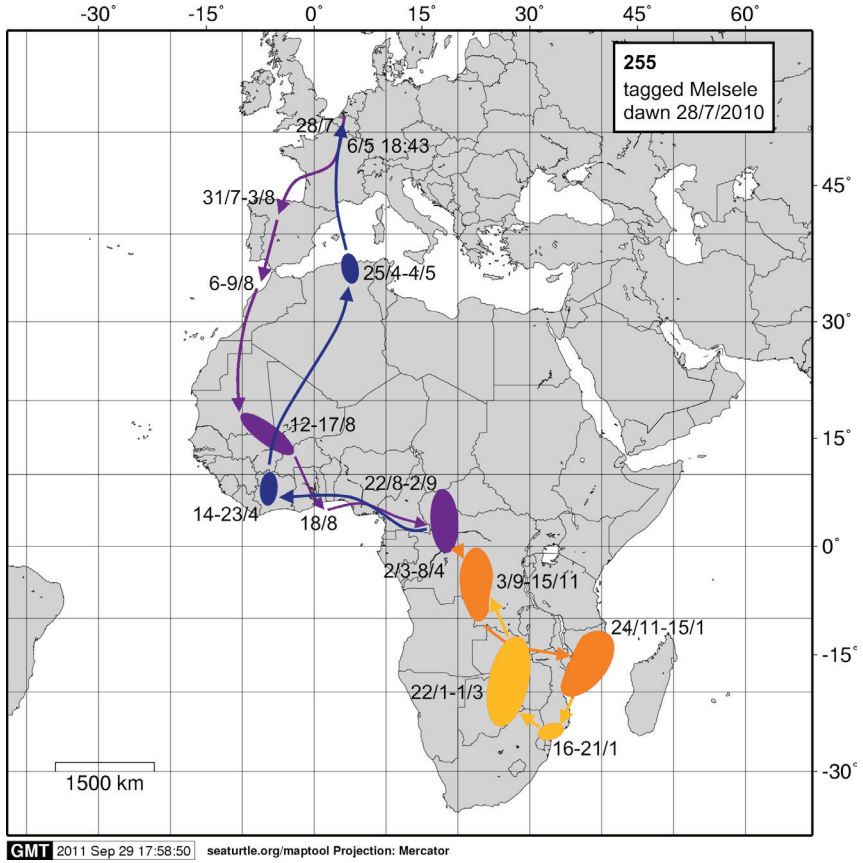
Throughout the talk reference will be made to how the species inspires people and how an interest in them can lead to addiction! The talk will conclude on an optimistic note pointing towards how the species can be used as a unifying force for conservation and for nations.

APPLYING CITIZEN-SCIENCE DATA AND LONG TERM STUDIES TO SWIFT'S CONSERVATION IN ITALY

Cucco M.*, Boano G., Ferri M., Lardelli R., Pellegrino I., Pinoli G., Pirovano A., Tinarelli R.

* marco.cucco@uniupo.it

The two species of *Apus* breeding in Italy and Canton Ticino (CH) are facing increasing difficulties and pose conservation and management problems. Both the Common *Apus apus* and the Pallid swifts *Apus pallidus* utilizes as nest cavities the roof tiles and holes that are found on buildings. They prefer monumental towers, castles, churches located mainly downtown, or special towers that were built centuries ago solely to favour breeding of swift. Some colonies have been studied for decades and have provided detailed long-term data on survival, moult, breeding success and swift behaviour. In the last decades, there is an increasing pressure on swifts



Migration routes of swifts between Europe and Africa as researched by the swift researcher Prof. Susanne Åkesson from the University of Lund in Sweden who placed data-loggers on migrating swifts (Courtesy of Prof. Susanne Åkesson)

Swift t-shirts were handed out to schoolchildren from 10 schools and visitors to Beit Schiff as part of a joint project with one of Israel's largest banks Photo: Amnonn Hahn

due to removal or obstruction of nest cavities to prevent the utilization by feral pigeons. In order to contrast this problem, we have developed four projects for the conservation of swifts involving citizens, birdwatchers and scientists collaboration. 1) the Swifts & Fun festivaldeirondoni.info is a festival aimed to encourage citizens participation through events organized near large swift colonies. The festival occurs in late June; in 2017 it engaged 72 different occurrences. 2) With over one million records per year, the Ornitho.it, is the main platform for collection of bird data in Italy. The management team has included a special window for the input of detailed data in case of swift colonies. 3) The Association for the protection of "Living monuments" Monumentivivi.it manages a website who provides data, localities, information and documents utilizable for the conservation of swifts, bats and other animals living on buildings. 4) The Association Progetto Natura has developed SOS Rondoni, a conservation project for the city of Milano. The activities include conservation and monitoring of swift colonies, as well as educational events with schools and general public and development of “good practices” with architects and stakeholders who operates on building restoration.

HOW TO CONDUCT A CENSUS OF SWIFTS IN A CITY LIKE AMSTERDAM, THE NETHERLANDS

Gert de Jong
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A census of Common Swift nesting sites was conducted in the period 2013-2017, an assignment by the city of Amsterdam to determine status and improve legal protection of nest sites.

The urban areas were stratified by year-of-construction and sections surveyed in succeeding years. Nest type selection is often the same in similar architecture. Survey times were predicted with this foreknowledge on habitat suitability and nest site availability. We visited all suitable areas in each of three periods (May, June and July). Nest entrances were identified by surveying areas on bicycle/foot, observing Swifts entering nesting sites, listening to birds on nests and by noting faecal traces. Since 2015 we designed and used a special on-line field app.

We registered 2031 active nest sites in Amsterdam. I will present a method to estimate population size from this count, considering that not all nests can be found in such a large area. Rooftile-related nests are still the most important nest type (nearly 50% of nest types), with nests in roof gutters as second. Nest site types shifted considerably since the 1970s,

showing flexibility by a population to changes in habitat. 8% breeds in nest boxes.

The majority of Swifts breed in pre-war areas, as expected, but comparison with historic data suggest a decrease in pre-war areas since the 1970s. This study also shows increasing numbers in post-war areas. A retrospective model suggests a decrease of around 50% for the entire population of Swifts in Amsterdam, since the 1970s. Separate monitoring in the Centre part of Amsterdam shows a more or less stable population in the last 5 years, with an increase of breeding in nest boxes, and a much faster change in nest sites than expected.

ARTIFICIAL SWIFT NESTS FROM THE MEDIEVAL PERIOD UP TO MODERN TIMES

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In a large area of Italian expression, since medieval times were build up "swift towers" (*torri rondonare*) actually made up of dovecotes, belfries, churches and dwellings (Ferri 2014), with tens and even hundreds of artificial nests. The first evidences of swift towers are in the dovecotes of fortified houses of the XIII century, as shown in a fresco of 1450-1470, and their shapes remained constant in thousands of structures built until the XX century, and although most them have disappeared remain evidences of rounded or squared entrance holes, nests cells embedded in walls or supported by inner shelves. The colonies were managed by a swift keeper monitoring the nests through little doors or plugs. The swifts were attracted to get their fatty chicks (Spallanzani, 1797), getting all but one of them (Savi 1827), in a way we may say "sustainable" for the colonies as proven by expensive structures with clusters of nests added through the centuries. The conditions for adult swifts and brood were rationally designed and managed to keep the birds safe from predators, weather conditions and competitor birds. In the Po River plain, the same method evolved to attract sparrows, maybe since 1500-1600, reducing the cells dimensions or adopting *terracotta* birds pots similar to those documented for starlings and sparrows in Netherlands, Belgium and north France since early 1400 (Labbé 2000). Maybe the regular ties between Italy and northern Europe allowed the exchange of a way of enriching the buildings as maybe happened also with Ottoman area of these times where religious architectures hosted decorated nests for small birds (swifts, swallows?) attracted only for devotional. The surviving ancient swift towers are a unique legacy for conservation, research and educational purposes as notably demonstrated by the detailed observations on the common and alpine swifts made in them by Spallanzani (1797).

The ancient swifts tower "Il Castellaro" (Regional Parc of Sassi di Roccamalatina, Guiglia, MO, Italy); just under 300 holes in the four walls updated three times from 1500-1800, rehabilitated in 1985, active in 2017 with a colony of 91 pairs of common swifts
Photo: Mauro Ferri

THE PROTECTION OF APUS APUS IN SEGOVIA, SPAIN

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Following the presentation conducted by Foro GeoBiosfera at the Cambridge and Szczezin swifts congress we continue working in the protection of swifts.

The current situation of the swifts population is that the number of specimens has been gradually decreasing from 20 years ago.

Among other causes we can point to the decrease in the lack of suitable hollows for nesting. The rehabilitation of building and construction works usually plug these holes traditionally used for the swifts.

The national and regional legislation protect specifically these birds and their nests, but the current situation is those legislation are not effective because the lack of control of the authorities and the lack of commitment of politicians and environmental responsables, including the local and national police bodies. The architects do not include in their projects the necessary measures in this regards. Another group involved in the necessary measures of protection is the ecclesiastical sector which has a great autonomy and is not environmentally supervised by the local nor the national authorities.

The church is the owner of a large number of churches, convents and ancient buildings used for swifts to nest.

The little progress in the protection of swifts and others birds is mainly due to the action of NGOs organization.

Foro GeoBiosfera will describe examples of these advanced at the height of local and regional level. We will present actions and works carried out and their positive results.

Finally, highlights of the change in attitude of some politicians, architects and builders.

SOME ASPECTS OF THE BREEDING BIOLOGY OF THE SWIFTS OF COUNTY MAYO, IRELAND

Chris Huxley – presented by Lynda Huxley
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Much of the Republic of Ireland has suffered a significant decline in the swift population as a result of the renovation and/or demolition of old buildings which had swift breeding colonies. Since 2013, County Mayo in the west of Ireland has been surveyed for breeding swifts and the location of every known nest site mapped. A total of just over 250 occupied traditional nest sites have been located and are being monitored by local volunteers. Nest box projects have been started in every town with breeding swifts in an effort to boost the population.

The erection in 2012 of four triple cavity nestboxes at the Castlebar Campus of the Galway Mayo Institute of Technology has provided the opportunity to study the behaviour of County Mayo's swifts at the nest site. Cameras were installed in all 12 boxes, with 11 of them used to "livestream" on the internet each year. The activity in some of the boxes where breeding has occurred has been recorded and subsequently analysed in order to examine the frequency and timing of the feeding of the nestlings. With detailed meteorological data available from the national meteorological agency, it is possible to compare feeding patterns with weather conditions in order to see if the notoriously inclement west of Ireland climate is making life difficult for the swifts.

Several thousand hours of video recordings were examined and the exact time of each feeding event logged. The results were tabulated together with the meteorological data (temperature, wind speed and precipitation) and correlations between these factors and feeding activity explored.

Since the study followed a very small sample of breeding swifts, we cannot yet be firm in our conclusions. However, the indications are that although bad weather does disrupt feeding activity, the food supply is such that nestlings grow as fast as elsewhere and fledge at around six weeks.

Other nesting behaviour was also recorded, including

the relationship between weather (wind speed) and the swifts' ability to gather nesting material as well as the apparently frequent dislodging of eggs from the nest.

A SWIFT WAY TO PEACE

Yossi Leshem* & Amnonn Hahn**

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Israel's location at the junction of three continents (Asia, Europe and Africa) has resulted in the region becoming a focus for conflict, wars and bloodshed since the dawn of history until present days. At the same time, the Middle East comprises a very significant bottleneck for bird migration in general, and for the swifts in particular. Approximately 500 million birds migrate over Israel twice a year.

Swift enthusiasts attend the annual June farewell ceremony during which swifts treated at the IWH are released; greeting the audience on the right (checked shirt), Yael Dayan, a sworn swift enthusiast
Photo: Yossi Leshem

In our lecture we will talk about a unique model in which, based on our past experience, we propose to use birds as a platform for cooperation in conflict regions throughout the world, under the slogan "Migrating Birds Know No Boundaries".

We will present three examples of regional cooperation that can provide a basis for implementing with swifts:

(1) Using Barn Owls as biological pest control agents in agriculture. See the recent article in NATURE at: https://www.nature.com/articles/d41586-018-01388-5.

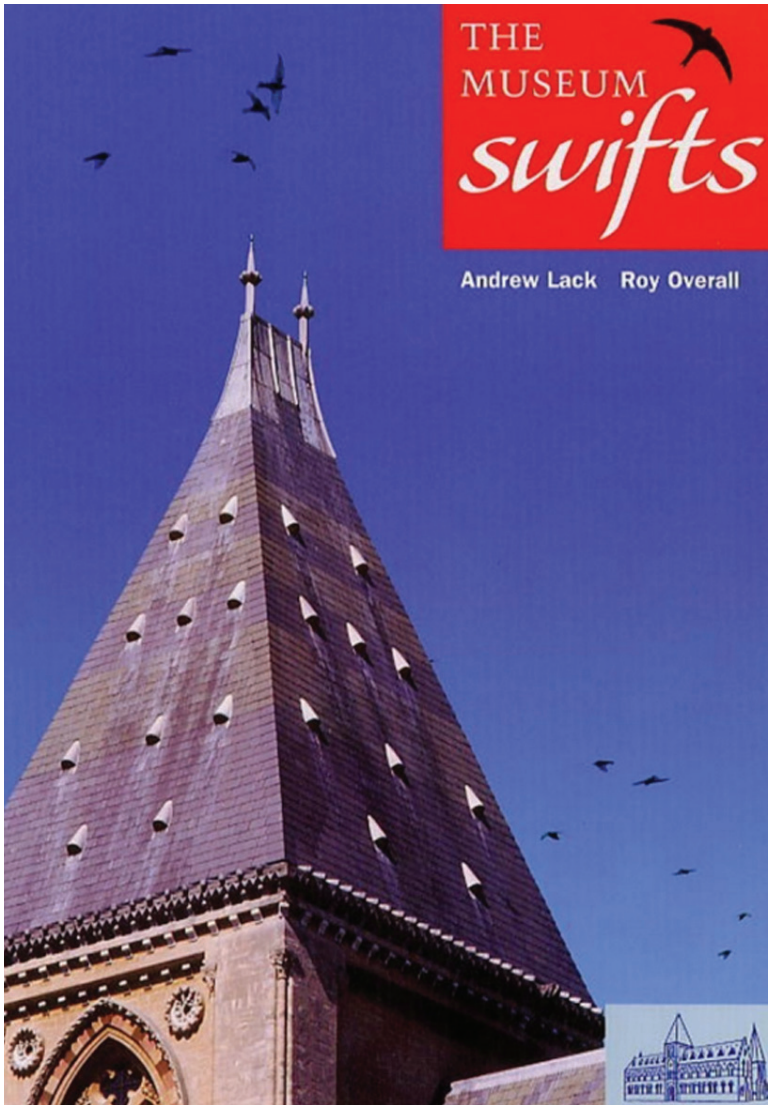
(2) Using the Internet to track German storks fitted with satellite transmitters which was developed into a scientific-educational project in the portal www.birds.org.il.

(3) The seminar "Artists for Nature – Saving the Dead Sea through art and music", held on both sides of the Dead Sea.

Swifts, as birds that nest in cities, have the unique potential to be promoted as a "flag species" for cooperation between nations focusing on twin cities that adopt the swifts and protect them, while observing them with online cameras in their nests, going on excursions to view them, carrying out research, building suitable nesting boxes etc., all this in our backyard.

In addition, the subject of swifts nesting in religious sites, holy to the Jews (Western Wall in Jerusalem's Old City), Christians (Church of the Sepulcher in the Palestinian Authority) and Moslems (mosques in Jordan), can constitute an exceptional infrastructure for connecting between religion and nature conservation

Swift tower on the roof of an advertising company in Tel Aviv with the designer/sculptor Reuven Givati
Photo: Amnonn Hahn



The famous swift tower at Oxford in the Science Museum building (from the brochure cover)

on a global level, while "recruiting" all the religious bodies to nurture the conservation of the swifts. The amazing story of the swallows of Mission San Juan Capistrano in California comprises the basis for assured success connecting between nature and the pilgrimage to religious sites.

To conclude, we propose after the conference to develop an action program to promote the swifts as a "flag species" to connect between people with different religions in conflict regions, as a leading urban species and as a living tool for cooperation.

A NEW SWIFT COLUMN FOR MODERN BUILT ENVIRONMENTS

Edward Mayer
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In order to survive Swifts need more nest places, as their old nest sites are lost when buildings are insulated and re-roofed, or demolished, and new buildings do not provide suitable apertures for them to nest in. However many architects, building users and

property managers are unsympathetic to the presence of wildlife within buildings; this is a problem that needs solving if Swifts are to survive.

Swifts however are known to nest in woodpecker holes. This gave me the idea for a new type of nest place, reproducing tree nesting within an urban structure.

To provide a solution to this problem of acceptability by those designing and managing the urban environment I devised a new Swift tower, known as a "Swift Column". Based on a new design of mobile phone mast, this tubular structure is intended to merge within the urban environment. A straight pole, it joins the many such poles within urban areas, holding up street lights, traffic signs, floodlights, solar panels and radio antennae. It is intended to be aesthetically unobjectionable, and effectively unnoticeable within a modern townscape.

The Swift Column holds eight plywood Swift nest cavities, and a cavity for small bats. It is equipped with a Swift call system. CCTV can be added. My concept was worked up into a detailed design by 51% Architects, who specialise in nest box design. The engineering aspects were handled by Hutchinson, a company that makes mobile phone masts. Looking like a mobile phone mast to us, and like a tree to Swifts and Bats, the Swift Column is a thoroughly thought out, well designed and manufactured solution to the problems facing Swifts.

It remains to be tested; the first one is to be erected this year outside Stratford International railway station in East London, others have been ordered for projects in Woking and Birmingham.

Imagined scene of two new Swift Columns situated at the 2012 London Olympics Velodrome site (Courtesy of Edward Mayer)

COMPARING INDIVIDUAL MIGRATORY SCHEDULE OF DIFFERENT ALPINE SWIFT POPULATION WITH GEOLOCATORS: HOW CONSISTENT ARE INDIVIDUAL STRATEGIES?

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Observing individual year-round behaviour of small migratory birds is technique challenging. Studies are typically conducted with only a few individuals and rare in more than one population. This hampers our understanding of how much variance we can expect in different migratory behaviours within populations. For example it remains unclear how synchronized arrival and departure times of different individuals in the same breeding population typically are. We investigated the annual migratory schedule of 155 alpine swift (Apus melba) individuals from four European populations along the latitudinal gradient over three years. We expected that populations at higher latitude have a shorted breeding season and that individuals have little flexibility in their arrival and departure times to fully exploit the short season. In contrast, at lower latitude the breeding season lasts longer and individuals could afford flexible schedules while still have a successful breeding season. This latter case offers insight how birds allocate their residential time between the breeding and the non-breeding range when having access time during the annual cycle beyond breeding and moulting. We will compare the migration schedule of population at different latitudes, test for the first time whether individuals are consistent in their strategy between years and investigate if proxies for food abundance could explain the different strategies in alpine swift.

WHAT DO WE KNOW ABOUT SWIFT NEST BOXES?

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There is now considerable experience in many parts of Europe of providing nest boxes for Swifts. Since medieval times when the Italians harvested Swift chicks from purpose-built castle-like Swift towers to today when there is a large variety of nest boxes of various sizes, shapes and materials, we do not have much idea of what is optimal. Studies of large numbers of existing nest boxes to try to determine the factors affecting occupancy rates and productivity are undermined by a host of confounding factors - too many uncontrolled variables.

Not least of these may be the birds themselves. Different Swifts may have different preferences depending on their habituation history. Swifts tend to copy what other swifts do, so provision of perfectly good nest places which are different may not be readily accepted.

Not only do we need to know what may be optimal, it is also useful to know what are the limits for a swift to accept a nesting place. Although the common recommendation for the height of a swift box is at least 5 metres, how low can you go before occupancy rates are also unacceptably low?

This talk will go through a number of case studies of nest boxing projects that have worked well as well as those that have not worked so well.

Some experiments undertaken by the speaker will be described. These experiments vary just one parameter, keeping all other parameters as similar as possible. For example including an artificial nest in every other box in otherwise very similar boxes. Comparing dark interiors to unpainted

A swift entering a nesting box from recycled ammunition cases Photo: Nir Kafri

interiors and small boxes with larger boxes. Not all of the results of these experiments are yet available.

As no one person may have the resources, or enough big enough projects to obtain large enough sample sizes, the objective of this talk is to inspire people to treat new projects as an opportunity to undertake an experiment to vary just one parameter between 2 values in every other nest box. Hopefully the results of experiments by different people can be combined to achieve something of statistical significance.

SWIFT FRIENDLY BUILDINGS IN THESSALONIKI CITY

Parcharidou Effrosyni*, Kalpakis Stavros, Prousali Sofia, Praxitelous Anastasia, Karagianni Pinelopi

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Action for Wildlife has started an attempt to preserve the buildings that swifts are nesting in Thessaloniki. Even though only a few buildings are restored every year, some of them host quite big swift colonies. The programme aims to preserve the nests at these

buildings during and after their restoration, and to inform people and services about the nests and the buildings. A building that is going to be characterized as "swift friendly" should be used in a way that no disturbance will occur during the reproductive (period) process. We have already co-operated with the supervisors responsible for the restoration of two buildings, but the programme is expected to start in spring 2018.

MULTI-FACETTED APPROACH OF LIBERI DI VOOARE FOR THE CONSERVATION OF SWIFTS IN ITALY

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Since 2012, the non-profit Association Liberi di Volare has worked actively to support the European swift species Common Swift (*Apus apus*), Pallid Swift (*Apus pallidus*), and Alpine Swift (*Apus melba*). The latter are considered locally threatened species, and are under pressure from human activities, in particular for what concerns the reduction of reproduction sites.

The multi-facetted approach of swift recovery and rehabilitation, raising public awareness, installation of artificial nests, lobbying to improve planning regulations, and promoting scientific research has aided the conservation of these species.

The Association is the only Italian bird rescue centre specialized in the care and rehabilitation of Apodidae and Hirundinidae. Concerning the protection of existing nest sites and creation of new ones, the Association has undertaken important partnership with the different local authorities. Another important target of the Association, is research, carried by collaboration with different scientific institutions. For example, the records of the Association on bird recovery (over 150 cases in 2017) represent a valuable data base for understanding the ecology of swifts in an urban environment. Feather implants are regularly carried out, using the techniques pioneered by the Mauerseglerklinik, Frankfurt, Germany. This contribution will describe the results of the conservation of European swifts, obtained in the last five year, by the activities of different working groups.

ELEMENTAL DISTRIBUTION IN FEATHERS OF THE COMMON SWIFT (APUS APUS), A PIXE, HARD X-RAY AND SOFT X-RAY FLUORESCENCE STUDY

K. C. Prince[(a)*], A. Gianoncelli[(a)], H-J. Shin[(a,b)], I. Zamboni[(c)], M. Jaksic[(c)], M. D. de Jonge[(d)], M. W. M. Jones[(d,e)], M. Sola[(f)], S. Pesaro[(g)]

[(a)] Elettra – Sincrotrone Trieste, Basovizza, Trieste, Italy.

[(b)] Pohang Light Source, Pohang, South Korea.

[(c)] Ruder Boskovic Institute, Zagreb, Croatia.

[(d)] Australian Synchrotron, Clayton, Melbourne, Victoria, Australia.

[(e)] Faculty of Health and Institute of Health and Biomedical Innovation, University of Technology, Brisbane, Australia.

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Trace elements in bird feathers are scientifically relevant for several reasons: they are a monitor of environmental quality where the bird feeds; they may provide information on the biology of feather growth; and they may have applications in determining the location of migratory birds at the time of feather growth. We have mapped the microscopic distribution of trace and other elements in bird feathers using three methods: Proton Induced X-ray Emission (PIXE, at the Ruder Boskovic Institute, Zagreb) [1]; hard x-rays (Australian Synchrotron,

Melbourne) [2] and soft x-rays (Elettra Sincrotrone Trieste) [3]. Light elements are best mapped using soft x-rays and elements such as Na, Mg, Si and Al are observed. Hard x-ray fluorescence is best for heavier elements, such as transition metals (Fe, Cu and Zn). PIXE constitutes an intermediate case with some light as well as heavy element sensitivity. The feathers were supplied by the Association Liberi di Volare from naturally moulted feathers. A second objective of this work was to compare the chemical composition of feathers of bird eating a natural diet, and feathers of (injured) birds raised in captivity, and fed a diet of farmed crickets. Chemically the feathers grown and moulted in captivity appear identical to those of wild birds.

[1] M. Jakšic et al, Nucl. Instrum. Methods B 260 (2007) 114–118.
[2] David Paterson et al., AIP Conf. Proc. 1365 (2011) 219.
[3] Alessandra Gianoncelli et al., J. Synchrotron Rad. 23 (2016) 1526-1537.

Melchett St. in Tel Aviv – the swift is an "urban" species that adds a unique flavour to heritage sites in the city
Photo: Elias Eli

MAHMIYAT.PS WEBSITE: ENVIRONMENTAL AWARENESS FROM THE VIRTUAL WORLD TO THE REAL WORLD

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Palestine is located in one of the most important junctions of wildlife richness and birds' migration routes in the world. In spite of its valuable resources, the capabilities of wildlife and birds monitoring in Palestine are inadequate. Specialists are few and lack basic tools to monitor and conserve this richness. Planners lack tools for embedding nature conservation into their work and decision makers are unaware of the importance and the potential of conserving the nature in the shadow of economic and urban development. For these reasons, since 2014 the Hanns Seidel Foundation –HSF- together with its partners, has worked on a project-based approach for building local and national capacities for nature conservation and birds monitoring. This bottom-up approach took it to the planners' level, further up to the decision-makers level and back down to empower local communities.

Surprisingly, the most important results of this project were those related to the establishment of the first web presence for the Palestinian nature

Swift chasing an insect just before catching it
Photo: Amir Ben Dov

reserves "Mahmiyat.ps". This website aims at promoting ecotourism and acts as an environmental awareness tool available for everyone. The website brings together the virtual world with the real world through implementing community events in the nature reserves under the brand name of "Mahmiyat.ps", which targets participants from all over the West Bank including families, children, women, students, youth, experts, institutions and professionals of different interests in wildlife photography, environmental studies, research, politics and others. The events gained the attention and support of the Environment Quality Authority, municipal leaderships and local communities, thereby raising the importance of the respective nature reserves for local villages. Different activities were implemented in the community events to portray the potential of nature reserves. Tour guides, trained through the project, led groups and helped the participants with flora and fauna identification. Remarkably, the activities helped clean many nature reserves since the events built ethical and national responsibility in the participants towards nature.

Between the virtual world and the real world, we are ready to do more for spreading environmental awareness!

AIRLINES - BIRD TRACKS IN THE AIR
A PHOTO-ART PROJECT TO VISUALIZE THE TRAJECTORIES OF BIRD

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- Brief introduction to my photo-art project **"AIRLINES - Bird Tracks in the Air"**
  The images show precise trajectories of a birds fly, similar to the contrails of airplanes. Thus they visualize many details of a birds flight in one picture.
- ***Iskiography*** (Greek: writing with shadow) versus ***Photography*** (writing with light) Brief explanation of how these images are created
- Aspects of technique, beauty/art, and science in the project
- The triggering roll of **swifts** for the project (I like to call the swifts the most reliable 'collaborators' of the project.)
- **Small scale motion tracking of swifts**
  What can we read or learn from these pictures about swifts?
  Speed, distance, flying activities and shapes (flapping, gliding), loop radius, foraging in the air etc.
- What else can we deduce from a swift-iskiography?
  Weather, thermals, insect/food availability, feeding, fun and joy?
- **Late** summer **'banging'** of swifts
  What is the reason/meaning of the massive visit of a nesting site within a few minutes?
- Flight patterns of **other birds** and the **interaction of different species**
- Flight patterns of **insects**, and insect count.
- The air as an important **habitat.**
  Air - our most **important food!**

The Tree of Hope in the Garden Of Hope at St. John of Jerusalem Eye Hospital
Sculptor: Mark Coreth 📷 Photo: Baruch Gian

THE COOLEST BIRD* – TRACING DIFFERENCES BETWEEN EUROPEAN AND AMERICAN PRESENTATIONS OF THE SWIFT

Katja Schmieder
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Following my 2016 paper on the representation of the Common Swift in recent European literature/ poetry and science, I would now like to extend my focus to the 19th century and to North America. Additional to the bird's capability of linking science to imagination, as well as connecting contrasting human feelings and ideas, I will examine what other secrets texts about the family Apodidae might reveal.

Throughout the 19th century, Europe and America underwent sea changes in technology, economy, culture – and global power. The self-confidence of the young capitalist nation state called USA and the struggles between traditions of monarchy and parliament in the United Kingdom as well as in continental Europe were also reflected in the way scientific and other texts were written. Thus, I will try to show how diverse European and American books and articles on swifts disclose their respective historical context. These birds came to represent and symbolize different yet specific worldviews and meanings.

When for example comparing what John J. Audubon and Alfred Brehm had to say about swifts, their texts surely explain research and facts about the birds, but at the same time we learn a lot about the historical context from which these writings emerged: While the American Swift was portrayed as somewhat special and symbolic of America's untamed nature (including North and South America), the depiction of the German "Mauersegler" alluded to colonial ambitions in Africa.

The findings by Ulrich Tigges (swifts and religion) and Simon Whitechapel (names and etymology) will be referred to.

* Title of a 2007 study on the American Black Swift by Rich Levad

AUDUBON'S VAUX'S HAPPENING PROJECT

Larry Schwitters* - presented by Diane Yorgason-Quinn**
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Audubon's Vaux's Happening Project was launched in 2008 to document the significance of a Vaux's Swift communal migratory roost site at a public school near Seattle that was to be demolished as an earthquake safety hazard. The numbers of swifts that roosted in that chimney that spring were astonishing. The project then secured $100,000 in government funding for a seismic retrofit rather than a tear down. The chimney now stands as a Partners in Flight Important Bird Area of Global Significance. Vaux's Swift has been designated the official "City Bird" and a commemorative statue placed at the city's major intersection.

We installed an IP security camera looking across the structure's opening and another, with a microphone, looking down. This never before seen swift action was recorded and live-streamed world wide.

The project quickly expanded to search for other major roost sites on North America's Pacific Flyway, draw attention to them, and hopefully keep them available for the swifts. We've now discovered roost sites from the Yukon to Guatemala, pushing our grand total of Vaux's Swifts documented going to roost to over 11,000,000.

Larry Schwitters, founder and continuing Project Coordinator, is pleased to have a long time major player in our successful endeavor, Diane Yorgason-Quinn, willing to make the long journey necessary to introduce you to these wee birds.

A WALK ON THE WILDSIDE – A LOOK AT SWIFT NESTING SITES IN THE NATURAL LANDSCAPE

Mark Smyth
enquiries@saveourswifts.co.uk

The talk will look at swifts which are still nesting in cavities in rocks of cliff sites within 'natural' landscapes in Northern Ireland. At least 3 sites will be looked at as examples. One in the coastal cliffs of North Antrim and two in inland cliff and quarry faces in County Fermanagh.

Consideration will be given as to why swifts are still found nesting in such sites compared with nearby buildings and potential man made sites. Possible reasons for this will be explored. Since many of these sites are in remote areas it is thought that there may be more to be found in that small numbers of swifts nesting in such situations can easily be overlooked.

A discussion will follow on as to what limits the number of sites within these rock faces available for nesting and how this impacts on the colony. Comparisons will be made between colonies which are limited by available suitable nest sites and those where nest sites are abundant or in some cases superabundant.

An examination of the colonisation of newly available sites by members of these colonies will be explored. A theory of how the swift breeding population 'naturally' colonises new breeding sites will be put forward. This will have practical implications for future swift conservation projects and help practitioners make more strategic decisions on how to more effectively conserve the species. Relationships will be explored between the evolution of the species and the need for enclosed nestsites with certain characteristics.

It will be postulated that there could be more sites such as those described still to be found in the wider countryside and landscapes.

Recommendations on how to search, survey and monitor such sites will be discussed. A view has been expressed in some parts of the UK that swift boxes and built in swift bricks coupled with the playing of swift calls should not be provided for the species as they interfere with "natural site" selection. This view will be questioned scientifically and rationally to see does it have any validity.

THE MAUERSEGLERKLINIK IN FRANKFURT

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It began in 1994 as a dream and become a leading Swift Care Center.

The founder, Dr. med. vet. Christiane Haupt, was enchanted by the Swifts during her internship at the Wildlife Conservation Center. In 1998 the first Swift Care Center was opened in Christiane's home 35 sq/m basement. It quickly became known and Swifts were arriving from everywhere. Her official State Exam took place while 32 swifts were waiting in the next room to be fed!

The rapid increase in public awareness resulted in more Swifts arriving for care.

The German Common Swift Association joined in and the Swift Care Center was moved to larger places. Since 2012 it is operating from a large 180 sq/m place in Griesheim, Frankfurt known as "Mauerseglerklinik". It has clinically fit rooms and has a significantly larger bird room, several feeding stations and even during the high season, new feeding helpers can be trained. The kitchen offers plenty of space for freezers with Swifts' food and a small sitting area. There is an office, an operation room and a flight training room with enough space for Swifts to fly around.

Since 1994 till the end of 2017, 11,781 Swifts have been treated. 778 during 2017.

The "Mauerseglerklinik" is also known for specialized in the unique operation of replacing defected feathers known as "Imping".

Alexandru Stahl and his wife Mihaela, are running the Swift Care Center in Bucharest, Romania. During

Tina Steigerwald, who also worked at the Mauerseglerklinik, here at the Israeli Wildlife Hospital (IWH) run jointly by the Ramat-Gan Safari and the INPA 📷 Photo: Ofer Brill, by courtesy of the IWH

winter, they arrive in Frankfurt to help Swifts from all over Europe. Alexandru is Christiane's colleague and was trained by her to be an Imping Master. During his stay, they are operating 1-2 Swifts a day. About every 2 weeks, the Swifts that were proven "fit to fly" will be released to Africa from the Canary Islands.

The "Mauerseglerklinik" has international cooperation with other bird protection and organizations worldwide.

CONSERVATION OF NEST-SITES OF COMMON SWIFT IN VIENNA – A CITIZEN SCIENCE APPROACH

Author: Thomas Starkmann*

Co-authors: Harald W. Krenn (Department of Integrative Zoology, University of Vienna), Ferdinand Schmeller (MA 22, City of Vienna)

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In 2017 the MA 22 (Municipal Department for Environment Protection of the City of Vienna) conducted a study about nest-sites of the Common Swift (*Apus apus*) in the City of Vienna, Austria. The focus of the study was to identify as many buildings as possible with nest-sites in order to enable target-oriented protection in the future. Therefore, not flying individuals were counted, but buildings with

nest-sites that were reported by citizens or already known by the department. In order to map as many buildings as possible, the citizen science approach was chosen. More than 40 volunteers helped to map the number of nest-sites at the reported buildings. According to Vargo et al. (2012) it is categorized as a scientific-training model. The standardized mapping was performed based on the proposed method of nest-site identification by Südbeck et al. (2005). The mapping took place in the evening hours, the observation of each building took at least 30 minutes and a nest-site was only counted, when a Common Swift was observed when entering or exiting. Altogether, more than 830 nest-sites have been mapped at about 240 buildings across the city. In the next years the study will be continued to hopefully become an on-going project.

The infrastructure (map, survey form, training,...) which was set this year, can be used and completed in the next years to gain a bigger database.

Südbeck P., H. Andretzke, S. Fischer, K. Gedeon, T. Schikore, K. Schröder and C. Sudfeldt (editors). 2005. Methodenstandards zur Erfassung der Brutvögel Deutschlands. Dachverband Deutscher Avifaunisten (DDA) e.V., Radolfzell.
Vargo, T.L., O. D. Boyle, C. A. Lepczyk, W. P. Mueller, and S. E. Vondrachek. 2012. The use of citizen volunteers in urban bird research. Pp. 113-124 in C. A. Lepczyk and P. S. Warren (editors). Urban bird ecology and conservation. Studies in Avian Biology (no. 45), University of California Press, Berkeley, CA.

DOES IT REALLY WORK?
TWO YEARS OF EXPERIENCES WITH ZOOLOGICAL BUILDING ASSESSMENT BEFORE ITS THERMAL INSULATION IN THE CZECH REPUBLIC

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Despite quite good legislation, real field conservation of the Common Swift (and other synanthropic birds) in the Czech Republic was poor. Two years ago, after almost three years of negotiations, the Czech Society for Ornithology, in collaboration with State Environmental Fund of the Czech Republic and Ministry of Environment of the Czech Republic, set up the rules for subsidies and grants related to energy savings for birds and bats protection during building adjustments and repairs. This effective set of tools include, besides other documents, also methodology of building assessment, qualification precondition for evaluators and definition of relevant constructions types.

The presentation summarizes existing experiences, based on analyses of realized researches, projects, workshops and practices of project managers, construction works suppliers, owners and state and NGO nature conservationists staff.

Ingolf Grabow, the "swift man" of Frankfurt, who worked with NABU to have 1,460 swift nesting boxes put up in his city Photo: Yossi Leshem

FIFTEEN YEARS OF REHABILITATING SWIFTS IN MY HOME (APUS APUS)

Judith Wakelam, Private Rehabilitator, England
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Since my first experience of hand rearing a swift chick in 2002 I have taken in and reared small numbers of swifts every year since. Swifts arrive from the general public, websites and local Veterinary practices. Although numbers are not high, usually between 35 and 50 my success rate has been good. In 2014 I had my only 100% success with all 26 of 26 swift chicks received, reared and successfully released. My usual success rate with chicks is between 85 and 95%.

Schiff House in Tel Aviv, a heritage site with nesting swifts ✎ Illustration: Tuvia Kurtz

Swifts - Munich, Germany - 18 June 2013 INPA
📷 Photo: Lothar Schiffler

The number of adults received is usually small. Some arrive no more than exhausted and in need of rest and rehydration but unfortunately sometimes I am unable to help and I am guided by my local Veterinarian.

Fed on a strict insectivorous diet plus vitamin and calcium supplements the chicks do well with release weights of between 38 and 48 grams. I always ensure every sheath is gone from every feather before release.

Sadly some swifts arrive having been previously fed inappropriately by their finder. Where possible I direct finders and in particular, veterinary practices to Swift Conservations website http://www.swift-conservation.org/ and Eric Fuste's findings on the dangers of a non-insectivorous diet for swifts.

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Swift drinking in flight above water
Photo: Marc Guyt
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LIST OF PARTICIPANTS

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Two swifts in flight with their shadows on nesting wall in the Netherlands
Photo: Marc Guyt
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THE FRIENDS OF THE SWIFTS ASSOCIATION (FOTS)

Amnonn Hahn, Director of The Friends Of The Swifts Association (FOTS), freeing a swift treated at the Israeli Wildlife Hospital back to the wild
Photo: Tibor Jäger, courtesy of the IWH

The FRIENDS OF THE SWIFTS association (FOTS) started operating during 2007 with the goal to protect the Common Swift population by helping them to keep on nesting.

FOTS was established by Amnonn Hahn, an amateur paraglider pilot who lives nearby the "Katzenelson" elementary school in Givatayim city. The school building was built in 1939 and had a tile roof which within years started to be used by some 20 pairs of Common Swifts as their nesting site. The school was fully renovated in 2006 and all the Swifts' nesting sites were blocked. Amnonn offered the school principle to enable the Swifts to keep nesting by installing special nesting boxes and the first Educational Swift Project was established involving the school children.

The project was awarded the Ford Conservation & Environmental Grant in 2008 and FOTS had started cooperating with the Society for the Protection of Nature in Israel (SPNI) to spread the Swift Educational Project. By now there are over 25 schools in Tel Aviv area alone that are Swift Schools and there are nearly 300 Swift nesting boxes installed in these schools.

When Tel Aviv's old Bauhaus designed buildings were declared by UNESCO as a World Heritage Site naming it "The White City of Tel Aviv", a unique cooperation was formed with Tel Aviv city Conservation Department and by now there are already five fully conserved buildings where the original Swifts' nesting sites were preserved and nearly 100 new Swifts' nesting boxes were added.

FOTS and the SPNI are conducting special events to raise the public awareness to the Swifts and to their situation and special needs.

As a result of all the above activities, there are more and more Swift nestlings that are being saved by people, mostly school children, and brought in for care at the Israeli Wildlife hospital (IWH) and both FOTS and SPNI are doing whatever they can to assist the IWH in the best way.

FOTS now has 84 members and in March 2018 it celebrates its 10th anniversary.

THE SOCIETY FOR THE PROTECTION OF NATURE IN ISRAEL (SPNI) AND THE HOOPOE FOUNDATION

A Eurasian Hoopoe nests in hollows in Oak tree trunks
Photo: Thomas Krumenacker

The Society for the Protection of Nature in Israel (SPNI) was founded in 1953 by a small group of teachers, scientists and kibbutzniks who were attempting to save the Hula Wetlands. 65 years later, the SPNI is still leading campaigns for nature conservation and the protection of the environment in Israel. The SPNI is the oldest and largest environmental organization in Israel and the Middle East today, with 60,000 members. The SPNI's Israel Ornithological Center (IOC) is the BirdLife representative in Israel.

The Hoopoe Foundation was founded seven years ago as part of the SPNI with the aims of making significant progress in protecting birds and their habitat, promoting educational projects and eco-tourism, raising awareness in the public, funding research that contributes directly to conserving biological diversity and promoting cooperation with the Jordanians and Palestinians.
The Foundation was established thanks to a significant donation from Racheli and Moshe Yanai to the amount of $10 million, and they were joined by an anonymous donor and the Gelfand Family Foundation who contributed to the founding of the "Nature Defense Forces (NDF) – Commanders Take Responsibility for their Environment".

During the years since its founding, the Foundation has initiated 45 projects for protecting birds and in parallel 54 Israel Defense Forces (IDF) commanders are leading projects for protecting nature and the open spaces together with their soldiers. Additional partners to this initiative are the Israel Nature and Parks Authority (INPA), Jewish National Fund (JNF) as of 2018 and the IDF led personally by the Chief of the General Staff Lt. General Gadi Eisenkot and Commander of the Technological and Logistics Directorate of the IDF Maj. Gen. Aharon Haliva.

The Foundation has been supporting projects for protecting swifts for six years in partnership with the Friends Of The Swifts Association (FOTS) – building nesting boxes for swifts in Tel Aviv and the IDF Headquarters, holding swift nesting surveys, ceremonies at the Western Wall in Jerusalem's Old City to welcome the swifts back and farewell ceremonies on their departure south in Tel Aviv, as well as additional activities with schoolchildren, soldiers and the public.

NATURE DEFENSE FORCES (NDF) – COMMANDERS TAKE RESPONSIBILITY FOR THEIR ENVIRONMENT

INSTALLING NESTING BOXES AT THE IDF HEADQUARTERS

The modern version of the prophet Isaiah: "They will beat their swords into plowshares and their spears into pruning hooks" (Isaiah 2:4)

June 1st 2015: The Chief of General Staff, Lt. General Gadi Eisenkot, releasing a Common Swift back to the wild at a ceremony at the IDF Headquarters in Tel Aviv Photo: IDF Spokesperson

The Israel Electric Corporation (IEC) played an active collaborative role in the swift project and installed the nesting boxes at the IDF Headquarters
Photo: Amnonn Hahn

Nesting boxes made from recycled ammunition cases
Photo: IDF Spokesperson

June 1st 2015: The Chief of General Staff and Col. Yigal Ben Ami, Commander of the IDF Headquarters Army Base, uncover the sign explaining the swift project in the framework of the NDF
Photo: IDF Spokesperson

SUSTAINABILITY IN TEL AVIV YAFO

Tel Aviv-Yafo has long been known as a liveable and sustainable city and one of the world's leading hubs for technology and innovation. The city persistently acts to ensure sustainable development while preserving the environment, and strives to achieve a perfect balance between economic and social development along with improving the quality of life.

Tel Aviv-Yafo municipality has defined a clear municipal mission and vision:

- To produce an attractive urban environment, which is open to renewal and preservation of the city's legacy, which includes land management for both urban construction and development while striving to reduce environmental hazards and promote multi-modal urban transport system.
- To encourage urban sustainability and improve the quality of life and the environment in the public sphere.
- To decrease **Tel Aviv-Yafo's** Ecological Footprint and preserve the natural habitat - through community engagement and professional leadership, while ensuring accessibility to environmental services and wellbeing to all.

KEY ACHIEVMENTS

SUSTAINABLE NEIGHBORHOODS - A citywide program already involving 7 neighborhoods of varied characteristics and socioeconomic levels. The program encourages residents to become involved in shaping their community and lifestyles to reduce environmental impact and enhance community wellbeing.

PRESERVING OPEN SPACES - There are a number of preserved open spaces in Tel Aviv, where one can find a rich variety of natural seasonal vegetation that add scenery and natural beauty to the city's landscape. The Municipality encourages and supports recreational, informational, and educational activities through the "Resident Trustees of Nature" framework it created.

COMMUNITY GARDENS - The Municipality helps groups of residents to establish community gardens for the purpose of 'adopting' and cultivating a selected open space in the city. These gardens are founded on ecological principles and on planting endemic vegetation that conserves water and is more pest resistant.

Tel Aviv-Jaffa, the nonstop city
Photo: Kfir Sivan

MUNICIPAL SUSTAINABLE AND HEALTHY FOOD POLICY - One of the main courses of actions in Tel Aviv-Yafo's Urban Food Policy is early childhood education. Several actions are being implemented aimed at improving the nutritional value of food served in kindergartens, as well as influencing food consumption habits to promote locally sustainable and healthy lifestyles.

MUNICIPAL RECYCLING A great deal of recycling is done in Tel Aviv, including: paper, plastic containers, small beverage bottles, batteries, scrap metal in compliance with the vehicle dismantling program, electronic waste, white paper (offices), cartons, textile/clothing – alongside educational activities at the kindergartens and schools.

SWIFTS ARE THE RESIDENT BIRDS OF TEL AVIV YAFO

Tel Aviv- Yafo Municipality instated a special dedicated program for augmenting and protecting Swift-nesting sites. Thus recognizes the importance of preserving this unique bird. Together with Friends of the Swifts (FOTS) and the Society for the Protection of Nature (in Israel), nesting boxes were installed across the city and in several schools with educational program accompanies the process. In addition, special measures are being taken to protect nests during the preservation process, for example, opening a special Swift Hospital which is operated by the Municipal Nature School.

Next to the swift tower at the 2014 International Swift Conference in Cambridge
Photo: Amnonn Hahn

The advertising campaign on the back of buses, to raise public awareness to the swifts and online cameras in the nests, won a prestigious prize in Israel and second place in the international advertising competition LIA in London in 2011
Photo: Amnonn Hahn

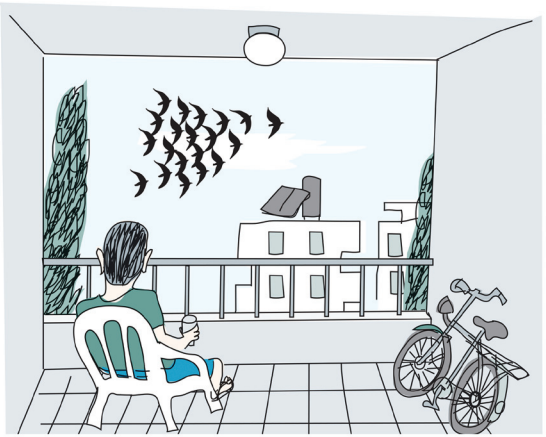
Studio Billet

FIFTH INTERNATIONAL SWIFT CONFERENCE

RUTH DANIEL RESIDENCE, TEL AVIV-JAFFA, ISRAEL

MARCH 11TH - 16TH 2018

The connection between buildings for restoring and the swifts that live in them is a winning combination Photo: Elias Eli



A person knows a bird for years and is still surprised by it; the poet and journalist, Ali Mohar, was crazy about swifts - the illustration with article by him was published in the paper "Ha'ir" [The City]
Illustration: Amos Biderman