TOGETHER

Local solutions for nature conservation
Lessons from the Mediterranean

CRITICAL ECOSYSTEM PARTNERSHIP FUND

BirdLife INTERNATIONAL · LPO · AGIR pour la BIODIVERSITÉ · DOPPS

The Critical Ecosystem Partnership Fund (CEPF) is a joint initiative of l'Agence Française de Développement, Conservation International, the European Union, the Global Environment Facility, the Government of Japan, the John D. and Catherine T. MacArthur Foundation, and the World Bank.
Additional support in the Mediterranean Basin is provided by the MAVA Foundation.

A fundamental goal is to ensure civil society is engaged in biodiversity conservation.

THE MEDITERRANEAN BASIN: TOGETHER FOR NATURE

Stretching from Cape Verde to eastern Turkey, the Mediterranean Basin Biodiversity Hotspot is identified as one of the world's 35 biodiversity hotspots – Earth's most biologically rich, yet threatened, areas.

But this politically turbulent region is also special because of its cultural diversity – necessitating a local approach to nature conservation that benefits both people and biodiversity.

Imagine bee-eaters, cave salamanders, geckos, macaques, dragonflies, pelicans for a flavour of the faunal diversity the Mediterranean Basin harbours – many found only in the region. Covering more than two million square kilometres, this biodiversity hotspot is also ranked as the third-richest in the world in terms of its plant diversity. Yet rapid economic development, an increasing human population, and 32% of the world's international tourists are creating unprecedented pressures on its natural resources.

Nature is local. Impacts are felt locally. The Critical Ecosystem Partnership Fund (CEPF) is tackling the threats to some of the world's most critical ecosystems by investing in local civil society, so local people and organisations can continue to protect nature in the future.

But CEPF is more than just a funding provider for local conservation projects. Through our Regional Implementation Team in the region, we have built up the smallest of civil society organisations, and discovered surprising similarities and lessons when successfully connecting together even the most diverse cultures and countries.

As well as celebrating five years of investment in the region, we are also sharing important learned lessons and best practices in conservation. This brochure aims to do both, and reveals some innovative project ideas to not only inspire future conservationists in the region, but to link them up with the now-experienced grantees for working together in future projects.

Inside you will find incredible species, motivating stories, complex threats, conservation successes and innovative ideas. So embrace the cultural and biological diversity, connect, learn, continue to promote local conservation, and read on to discover more.

LIZ SMITH
Regional Implementation Team Manager
for the CEPF Mediterranean Basin Biodiversity Hotspot

> **This network is not just 93 civil society organisations supported by CEPF.** It is also 93 organisations who work together more and more as a team to preserve the amazing biodiversity of this region.
>
> **Despite facing a lot of difficulties today and in the future,** civil society organisations are finding inspiration in the work of their fellow CEPF partners from other countries in the hotspot.

PIERRE CARRET
Grant Director CEPF

CRITICAL ECOSYSTEM PARTNERSHIP FUND

INVESTING IN CIVIL SOCIETY

90%

OF ORGANISATIONS LOCAL WITHIN THE MED

$10.9 million invested in the region

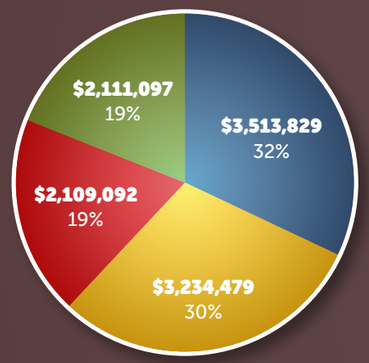
93 organisations funded

106 grants awarded

$2 million extra leveraged by civil society for conservation

12 developing countries funded

TACKLING THREATS



CONSERVING AND PROTECTING KEY SITES

STRENGTHENING CIVIL SOCIETY

MINIMISING THE NEGATIVE EFFECTS OF COASTAL DEVELOPMENT

MANAGING FRESHWATER CATCHMENTS SUSTAINABLY

IUCN RED LIST SCALE

- EX — EXTINCT
- CR — CRITICALLY ENDANGERED
- EN — ENDANGERED
- VU — VULNERABLE
- NT — NEAR THREATENED
- LC — LEAST CONCERN

4

HOTSPOT HIGHLIGHTS

$10.9 MILLION FOR MAKING A DIFFERENCE IN THE MEDITERRANEAN

LEGEND

- Mediterranean countries with CEPF-granted conservation projects
- Examples of best practices
- Page numbers
- All figures are in United States dollars

12-13
KARST CAVE SYSTEMS
Bosnia & Herzegovina, Montenegro, Albania

OLM
Proteus anguinus
VU

6-7
SKADAR LAKE
Montenegro, Albania

DALMATIAN PELICAN
Pelecanus crispus
VU

16-17
ADRIATIC COASTLINE
Albania

LOCAL COMMUNITIES
Nature-based tourism

18-19
SANTA LUZIA, RASO & BRANCO
Cape Verde

CAPE VERDE SHEARWATER
Calonectris edwardsii
NT

8-9
KURIAT ISLANDS
Tunisia

LOGGERHEAD SEA TURTLE
Caretta caretta
EN

14-15
EHMEJ, SARADA & BASKINTA
Lebanon

SOFAR IRIS
Iris sofarana
EN

10-11
WADI MUJIB RESERVE
Jordan

NUBIAN IBEX
Capra nubiana
VU

5

CONSERVATION OUTCOMES

7
new Protected Areas established so far

143,680
hectares of Protected Areas expected

11
policies, laws or regulations created so far

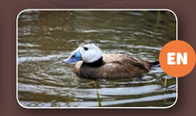
1,495,139
hectares of Key Biodiversity Areas with strengthened protection

7
conservation networks created so far

146
communities benefited so far

OTHER SPECIES BENEFITED

EN — **BARBARY MACAQUE**
Macaca sylvanus

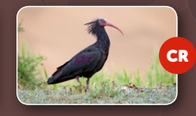


EN — **WHITE-HEADED DUCK**
Oxyura leucocephala

EN — **MED. MONK SEAL**
Monachus monachus

EN — **EGYPTIAN VULTURE**
Neophron percnopterus

CR — **ALGERIAN FIR**
Abies numidica



CR — **NORTHERN BALD IBIS**
Geronticus eremita

VU — **LEBANESE CEDAR**
Cedrus libani

CR — **RASO LARK**
Alauda razae

PROTECTING THE GENTLE GIANTS OF THE WETLANDS

Using nesting rafts and video monitoring to conserve bird breeding colonies

"With a wingspan of almost three metres and weighing over 10 kg, you can imagine that it would be like a small person standing next to you. Just without a voice for his rights."
Bjanka Prakljačić

OVERVIEW

Even one of the world's largest birds is not immune from natural and human impacts on wetlands. Despite their size, Dalmatian Pelican are easily affected by human disturbance, persecution, seasonal flooding and wetland changes, meaning they are listed by BirdLife International as Vulnerable on the IUCN Red List.

Skadar Lake harbours an important nesting colony that has suffered an 80% population decrease since the 1970s. This is an especially pressing conservation issue because the species is an ecological indicator for the health of the lake, an emblem of Skadar Lake National Park; and this work a "flagship" example of wetland conservation.

A conservation project has utilised the power of participatory planning to successfully protect the Dalmatian Pelican from threats and increase the colony's population in Montenegro, through a set of good management practices that have involved all local stakeholders.

The colony of "gentle giants" now nests on purpose-built rafts which are video-monitored 24 hours a day so threats can be responded to immediately. Community outreach and encouragement of ecotourism opportunities sees local people embracing all things pelican. With nesting success increasing, the time of the pelican is coming again to Skadar Lake.

WHERE
Skadar Lake, on the border
of Montenegro and Albania, Europe

• • •

KEY SPECIES
Dalmatian Pelican
Pelecanus crispus (Vulnerable)

• • •

PROJECT PARTNERS
Noé Conservation, Public Enterprise National Parks Montenegro, the Natural History Museum of Montenegro, the Centre for Protection and Research of Birds in Montenegro (CZIP), EuroNatur, Tour du Valat, and INCA

PELICAN PROBLEMS

SEASONAL FLOODING

Natural nesting sites for Dalmatian Pelican on Skadar Lake are mainly reed and peat islands that are prone to flooding during spring storms – this is a major problem for the nesting success of such a small colony.

The project team created four manmade buoyant nesting rafts, which, unlike terrestrial nests, are able to rise and fall with the changing water level.

The first generation of rafts was made mainly of wood (3-4 year lifespan); the latest generation will be built from polypropylene pontoons (30 years with limited maintenance).

The pelicans had no problem adjusting to the new platforms. In large waves, the pelicans are hesitant to sit on the bobbing rafts, but still nesting success is better than a terrestrial nest which would be flooded at that time.

HUMAN DISTURBANCE MANAGEMENT

"Motivating people to protect a species is the most important task," says Bjanka Prakljačić. "We humans are the ultimate problem solvers, so call on humans when you have a problem."

Several measures have been used to manage the disturbance of Dalmatian Pelican on Skadar Lake. The most important is remote video surveillance. Cameras have been installed on the nest rafts, powered by solar panels mounted on the rafts. Videos and screen-shots from the colony are then sent via a GSM signal to a distant computer, avoiding the need for long cables leading to the colony. Another important factor in mitigating disturbance of the pelican's colony is control of the intentional and unintentional access to the colony by local communities. Local stakeholders (fishermen, national park rangers, policemen, tourist boat operators, etc.) have been involved in discussions and a unanimous decision was made to respect a 300 m no-approach zone between December and July when pelicans are nesting. Zonation by anchoring of floating buoys was established.

Pelican hotline: violations are reported immediately, in response to which the national park authority sends out a ranger and a patrol boat.

Pelican Day and Pelican Villages: the project is also developing ecotourism on and around the lake, with information centres, non-invasive boat tours and observation points. Fishermen, who disturb the birds and compete for fish, can gain a financial benefit from the pelicans that will compensate for any loss of fishing income.

NESTING SUCCESS A RECORD HIGH SINCE 1977

2013
PROJECT STARTED

2014
A RECORD NUMBER OF **48**
PELICAN CHICKS FLEDGED

2015
40 CHICKS FLEDGED

2016
40 CHICKS FLEDGED.
NUMBER OF DISTURBANCE
INCIDENTS CAN BE COUNTED
ON ONE HAND

FUTURE
"THE PEOPLE OF SKADAR LAKE SEE THE THRIVING DALMATIAN PELICANS AS THEIR NEIGHBOURS, FRIENDS AND BUSINESS PARTNERS."
Bjanka Prakljačić, Noé Conservation

• • •

LINKS www.birdlife.org/worldwide/news/pelican-hotline
YOUTUBE "Saving the huge Dalmatian Pelicans of Skadar Lake"
CONTACT Bjanka Prakljačić | bprakljacic@noe.org

TWO ISLANDS, ONE VOICE

A single, united team of many local groups is best for conserving an important natural area

Rare marine plant formations, nesting migratory birds, two uninhabited islands with beautiful sandy beaches. This might seem like a safe place for a rare species of turtle to nest, but Kuriat Islands in Tunisia are swamped every summer by thousands of tourists. Even local artisanal fishermen who frequent the islands can be unaware of their importance for the loggerhead sea turtle *Caretta caretta* – the only place in Tunisia where this Endangered species nests, and the most important in the southern Mediterranean. Sea turtle populations are also devastated from bycatch in fishing nets, when they are then sold for meat.

OVERVIEW

Often in the Mediterranean, especially in North Africa and the Middle East, important sites for nature are the responsibility of many different governmental departments or organisations. This can often result in inefficiencies. Instead of one person or a small group of people being held accountable for the fate of, for example, a Key Biodiversity Area (KBA) or protected area, there can be shifts in blame and conservation is neglected. This has been the case for the Kuriat Islands, Tunisia.

A local group of nature enthusiasts and local divers in Tunisia, which evolved out of Arab Spring into a fully fledged NGO called *Notre Grand Bleu ("Our Big Blue")*, took the problem into their own hands and found a solution.

They formed a committee of local stakeholders, who share their concerns at one table and get things done, acting and requesting action from government as "one big voice". Local civil society is therefore a powerful force for the supervision and management of the protection of the area. This is also good for awareness amongst stakeholders such as fishermen and tourist operators, because local people get engaged with "their" site and are concerned for its conservation.

WHERE
Kuriat Islands, two islands 18 km off the coast of Monastir Bay, Tunisia

• • •

KEY SPECIES
Loggerhead Sea Turtle
Caretta caretta

• • •

PROJECT PARTNERS
Notre Grand Bleu, APAL, PIM, RAC/SPA

OUR ISLANDS: THE FACTS

Despite being proposed to be part of a future Marine and Coastal Protected Area, Kuriat Islands have no legal protection. **Whose responsibility is it to protect the area and its turtles?**

- The site is the responsibility of the Ministry of Environment and the Ministry of Agriculture; part of it is owned by the Ministry of Equipment and the Ministry of Defence, and no conservation action happens.
- Civil society (Notre Grand Bleu, NGB) therefore took on the responsibility to protect the turtles and the area.
- NGB formed the first ever co-managed committee for nature conservation in Tunisia. This allows local coordination of the site's management without heavy bureaucratic steps.
- The committee is formed of 18 local stakeholders: private sector including tourism operations and fishing, university and research, civil society organisations, the military, government and a veterinary care centre.
- A participatory approach: the committee meets regularly and has signed an official agreement to control the management of the area.
- A capacity-building programme has been put in place to support the development of the small local organisations, including training in administration and field work.

TAKING MATTERS INTO LOCAL HANDS

- An invasive species eradication and litter clean-up campaign, where 50% of people involved with the work were from the tourism and fishing sectors.
- The principle users of the site have been involved with a system of mooring to prevent damage to the ecosystem.
- The committee bought ecological nets for the fishermen that could not afford them. As a result of turtle conservation awareness, fishermen are now aware of the importance of the Endangered turtles: the number of turtles rescued by fishermen (rather than being sold for meat on the black market) increased from 3 to 12 per month in 2016.
- Through the committee, fishermen now know about the Turtle Care Centre, and bring injured turtles for care and release.
- The committee arranged for official restricted access areas for turtle nesting.
- The military had 200 goats on the islands, which damaged the turtle nests and ecosystem. The committee formally requested to the Ministry of Defence to have them removed to the mainland. One big voice spoke and the Ministry agreed.

PROBLEMS & SOLUTIONS

Public site is owned by two or three administrations, but no-one is actively involved in site protection.

Gather important site administration authorities under one umbrella, led by an NGO. Call it the "Site Management Committee." All stakeholders working together, led by civil society, is the best way to communicate and make requests.

The protection of the site is often hindered by many heavily bureaucratic steps, bouncing back and forth between different stakeholders.

Gather all key local stakeholders together under an agreement to supervise the Management Committee plans – with clear actions.

Local stakeholders don't have a sense of pride in the area, or understand the threats they are causing to nature.

Involve all site users in conservation management through different activities, so that they take ownership of their area and understand why to care for it.

FUTURE

"ENGAGING LOCALS IN CONSERVATION ACTIVITIES GIVES THEM A SENSE OF BELONGING AND CREATES COMMITMENT TO GOOD ENVIRONMENTAL PRACTICE. CO-MANAGEMENT LEADS TO CO-PROTECTION, AND WILL HOPEFULLY LEAD TO A COASTAL PROTECTED AREA."
Jamel Jrijer, Notre Grand Bleu

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LINKS www.birdlife.org/worldwide/news/atlantic-mediterranean-turtle-conservation-overcoming-similar-challenges | www.notre-grand-bleu.com
CONTACT Jamel Jrijer | jrijer@gmail.com

GREEN FODDER

New tech helps vulnerable villagers whilst protecting natural reserve

SOCIAL		ENVIRONMENTAL
People living in poverty, rely on their livestock for income.	›	Not enough space for livestock to graze, and producing feed degrades soil.
Buying imported dry fodder in the winter is expensive, and price fluctuations impact on lives.	›	Important reserve is overgrazed, destroying rare flora and unbalancing ecosystem.
Lack of water means lack of nutritional fodder so livestock unhealthy.	•	People living with these pressures not aware of the environmental importance the reserve.

OVERVIEW

Small shrubs pepper an arid landscape of steep, sandy mountain slopes, where water is scarce and the sandy soil barren. On the edge of the Wadi Mujib Biosphere Reserve in Jordan, people live a traditional pastoral lifestyle below the poverty line. With livestock-keeping their main, or only, source of income, the conditions mean the 8,000 villagers of Faqou struggle to give their sheep the nutrition they need. Their care of their livestock leads to overgrazing in the Reserve, which supports a surprising variety of plant species including rare orchids, and several highly-adapted mammals including a threatened large wild mountain goat, the Nubian Ibex.

Imagine, then, a solution that allows people to grow cheap fresh green feed for their livestock in just seven days, all year round. Is there an innovative agricultural solution that takes little space, uses water efficiently, does not degrade the soil, uses no pesticides, improves food security, adjusts to climate change, improves people's livelihoods and relieves pressure on nearby reserves so nature can flourish too? Yes, it is called a 'green fodder unit'.

WHAT IS GREEN FODDER TECHNOLOGY?

- **FODDER** Food given specifically to livestock, rather than foraging for themselves.
- **GREEN FODDER** Fresh green vegetation for livestock, rich in minerals and protein, as opposed to the expensive dry feed that herders would have to buy and import when they cannot produce fodder on their land.
- **HYDROPONIC GREEN FODDER UNIT** A method of growing green fodder in water without soil, using mineral nutrient solutions, and taking up little space as an indoor unit stacks green fodder horizontally. Electricity for lights is provided by solar panels on the roof of the unit.

A pilot green fodder unit was installed by SDAR working with the sheep farmers of Faqou's Agricultural Cooperative Association, and has proved very successful. The ownership of the unit was transferred to the association, and, despite difficult early stages where locals were hesitant to buy fodder produced by this new technology, sheep farmers continue to purchase the green fodder rather than grazing on the reserve.

WHERE
Faqou village and Wadi Mujib Biosphere Reserve, Jordan

PROJECT PARTNER
Sustainable Development of Agricultural Resources (SDAR)

KEY SPECIES
Nubian Ibex
Capra nubiana,
43 rare plant species

SOLUTIONS

- Hydroponic green fodder unit installed, which produces fodder reliably throughout the year with very low running costs.
- The unit consumes minimal water, generates minimal pollution, and saves soil degradation.
- Green fodder production saves vertical space.
- Workshops were held to ensure local people fully understood the benefits and were on board with the project, so sheep farmers bought this fodder.
- Ownership of the unit transferred to the local cooperative, so they sell green fodder at a price beneficial to the sheep farmers, and improving income and living conditions.
- Fodder of high nutritional quality produced, allowing for increase numbers of livestock per family, so better production of meat, milk and other products.
- Grazing pressure on the reserve relieved, and minimal impact on biodiversity, as opposed to traditional fodder production.

As well as promoting 'community management' of a new resource, the project has also raised villagers' awareness of Wadi Mujib and its unique nature, and the impacts of the different choices they can make when feeding their livestock.

Pilot green fodder unit produces 0.5 ton of green fodder per round, sufficient to feed 200-220 goats using only 100 litres of water per month (recycled for a period of one month). It is estimated that this saves up to 10 hectares of grazing land on the reserve in the first year.

FUTURE

"NOW PEOPLE REALISE THE IMPORTANCE OF THE FLORA AND FAUNA AROUND THEM, AND WE SEE THIS TECHNOLOGY EXPANDING TO OTHER SENSITIVE AREAS IN THE MIDDLE EAST."
Rami El-Akhras, SDAR

...

LINKS www.birdlife.org/worldwide/news/cepf-green-fodder-project-benefits-villagers-and-biosphere-reserve | www.usdwe.org
CONTACT Rami El-Akhras | rami.elakhras@gmail.com | info@usdwe.org

OUT OF THE CAVE

Finding and protecting hidden species: environmental DNA

Amongst cold, dark caves of dripping stalagtites, there is a diverse community of highly-adapted subterranean species. A scientific breakthrough is helping ensure they are monitored and protected in the future.

OVERVIEW

How do you find physical evidence of a rare species when most of its habitat (the subterranean rivers of limestone cave systems in the Balkans) is inaccessible to humans? The "human fish" is the largest cave animal in the world. Despite this, *Proteus anguinus* – a blind, entirely-aquatic salamander commonly known as the olm, and endemic to the Dinaric Karst – is incredibly difficult to find.

Just because it is hidden, does not mean underground biodiversity should be forgotten.
Olm is listed as Vulnerable on the IUCN Red List and an indicator of water quality. The rare black olm, a distinct morph (and possibly even a separate species), is known to be restricted to a habitat of less that 30 km^2 in S.E. Slovenia – a single pollution event or badly-planned quarry could wipe it out.

"NOT ONLY WOULD WE LOSE SUCH AN EXTRAORDINARY AND UNIQUE ANIMAL, BUT THE PEOPLE OF THAT REGION WOULD LOSE THEIR ONLY SOURCE OF DRINKING WATER IN THE SAME MOMENT."
Gregor Aljančič

WHERE
CEPF-funded work in cave systems of Bosnia & Herzegovina, Montenegro, Albania

PROJECT PARTNER
Tular Cave Laboratory, Društvo za jamsko biologijo (Society for Cave Biology, SCB)

KEY SPECIES
"The Human Fish"
Olm *Proteus anguinus* (Vulnerable)

CRITICAL FACTS

- Olm is a threatened species, evolutionary distinct and highly endemic to the region.
- The Dinaric Karst is the largest continuous karstland in Europe, a global hotspot of subterranean biodiversity.
- Cave species can be restricted to specific cave systems, and are hard to monitor by traditional means (trapping, visual observation) because of their inaccessibility.
- Groundwater extraction, river damming, and agriculture all pose new threats to species living in limestone karst systems.
- Species with little distribution data are not well protected by official legislations and the impact of new threats cannot be predicted.
- If the species can be detected, they can be protected.
- Olm has even become a flagship species for subterranean fauna, and has helped draw attention to karst ecosystem services and their value for human health.
- The public have also been involved in 'olm rescues', when they find them washed out of caves into the fields after floods.

NOVEL TECHNIQUES: eDNA

DISCOVERING THE PRESENCE OF HARD-TO-REACH CREATURES: ENVIRONMENTAL DNA (eDNA) SAMPLING
SCB's project was the first time eDNA sampling was used successfully to detect a subterranean organism, which they did from easy-to-reach outflows of underground rivers.

1. ANIMALS AND PLANTS NATURALLY RELEASE THEIR DNA INTO WATER

2. TAKE WATER SAMPLE IN THE FIELD TO DETECT SIGNATURE eDNA

3a. FOR DETECTING SPECIFIC SPECIES: eDNA

- Test for presences of small signature DNA sequences of your target species, e.g. olm.
- Quickly obtain results in the field.
- Previous samples of the species needed.

OR

3b. FOR DETECTING ALL SPECIES: eDNA METABARCODING

- Use 'Next Generation Sequencing' techniques which can process a large amount of DNA quickly in the lab.
- Compare the results to a database (e.g. GenBank) to create an entire picture of the biodiversity in aquatic habitats.

UNDERSTANDING DISTRIBUTION

- eDNA techniques were used to find the first physical evidence of olm in Montenegro.
- Number of known olm localities in Trebižat River & Hutovo Blato priority Key Biodiversity Area (KBA) doubled.

PROTECTION

- Understanding its distribution has provided a strong argument for the full enforcement of legal protection for olm in Bosnia & Herzegovina, and to help guide management.
- Evidence has been provided for appealing and advising the nature conservation authorities in Montenegro to start all necessary practical actions to protect olm.
- This work has influenced the protection of three KBAs through proposals for EU Natura 2000 sites.
- Once the authorities are willing, eDNA sampling could form a basis for future monitoring schemes, from Bosnia & Herzegovina to Montenegro and Albania.

FUTURE

"THESE TECHNIQUES HAVE BROUGHT CHARISMATIC SUBTERRANEAN SPECIES INTO THE LIGHT OF PUBLIC FAME, AND ENGAGED SUPPORT TO PROTECT THEM FROM FUTURE THREATS."
Gregor & Magdalena Aljančič, Tular Cave Laboratory, SCB

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LINKS ow.ly/BByF306ev6h | www.tular.si CONTACT Gregor Aljančič | gregor.aljancic@guest.arnes.si

GROWING HOPE FOR RARE PLANTS

Engaging with people to create Plant Micro-Reserves

"As scientists, we must gain knowledge about these plants and their threats, but we also have another role: to spread awareness about the unique richness of the area, and to build the skills of local people to manage and protect their plants."
Magda Bou Dagher Kharrat, USJ

OVERVIEW

At shin-height on a mountainous pasture, large purple petals fan out like butterflies taking flight: found only in Lebanon, the Sofar Iris is as much beautiful as it is fragile. With a unique geographical position between three continents and a dramatic mountainous landscape, Lebanon is a hotspot of endemism. For plants (2,600 different species in Lebanon with 12 percent of these endemic), the smallest pocket of ideal conditions – humidity, altitude, temperature, etc. – can be a refuge for an entire species, often completely unknown to people.

But these key sites are increasingly encroached as this already densely populated country urbanises and industrialises, with untold species disappearing before they are recognised or studied.

How to protect these endemic plant "pockets" before it is too late? In Lebanon, they are often found outside national nature reserves, meaning creating new protected areas is crucial. When plants occur on private lands, involvement of local people is crucial.

WHERE
Ehmej, Sarada & Baskinta in Lebanon

PROJECT PARTNER
University of Saint-Joseph, Lebanon (USJ)

KEY SPECIES
Sofar Iris *Iris sofarana*, Round-leaved Sundew *Drosera rotundifolia*, Nazareth Iris *Iris bismarckiana*

A MICRO-SOLUTION FOR BIG WINS IN LEBANON

GET THE SCIENCE

- Bring experts together to thoroughly collate and analyse data on plant distribution and abundance. USJ organised a comprehensive three-day workshop of experts, classifying Lebanon's plants according to IUCN's Red List criteria.
- Based on the rarity and threat status of the plants identified, select priority Plant Micro-Reserves. Existing legal framework and management philosophy of nature reserves can be adapted to smaller areas.

ENGAGE WITH LANDOWNERS TO PROTECT PLANT MICRO-RESERVES

PLANT MICRO-RESERVE
EHMEJ
55 HECTARES

KEY SPECIES
SOFAR IRIS
Iris sofarana
Endangered

LAND OWNERSHIP
PUBLIC (& PRIVATE)

APPROACH
› Discussions with municipality authority
› Invited landowners to meetings
› Future scenarios explored

OUTCOMES TO DATE
Official state protection as a "Natural Site"; and written agreements between municipality and landowners to seek special permission and USJ involvement if private land usage changes threaten plants.

PLANT MICRO-RESERVE
BASKINTA
12 HECTARES

KEY SPECIES
ROUND-LEAVED SUNDEW
Drosera rotundifolia
Least Concern; rare nationally

LAND OWNERSHIP
PRIVATE

APPROACH
› Two years of discussions, consultations and linking with local associations
› Convinced on importance of site
› Future scenarios explored

OUTCOMES TO DATE
Landowner protected site, considering it a "private botanical garden" open to scientists and 'curious public', without the need for official state involvement.

PLANT MICRO-RESERVE
SARADA
10 HECTARES

KEY SPECIES
NAZARETH IRIS
Iris bismarckiana
Endangered

LAND OWNERSHIP
RELIGIOUS (CHRISTIAN) *Waqf*

APPROACH
› Linked messages of Pope Francis about loss of biodiversity
› Lots of discussions and site visits
› Explained uniqueness of Iris

OUTCOMES TO DATE
Religious leader dedicated 1 million sq. metres for the protection of this plant; and demands Ministry of Environment to classify as a "Nature Reserve" (the highest level of protection).

ADVICE FROM THE FIELD: GENERATING CONSERVATION SUPPORT AND STEWARDSHIP

- When raising awareness, respect the fact that local knowledge has a long history, and that local people use natural resources in their daily lives.
- Convince people that it is in their interest to protect these species.
- Locals who are experts in their field may not necessarily be aware of the importance of conservation, but once enlightened they will do their job better than no other.
- Build "trustful" relationships: visit stakeholders very often, and try to help build their capacity instead of doing all the work yourselves.
- "Teach them how to fish" instead of giving just the final product.

FUTURE

"THIS IS A NEW CONSERVATION APPROACH FOR THE MIDDLE EAST WHICH CAN BE REPLICATED TO CONSERVE POCKETS OF HIGH ENDEMISM THAT FALL OUTSIDE NETWORKS OF PROTECTED AREAS."
Sharif Jbour, BirdLife/CEPF Middle East

LINKS www.birdlife.org/middle-east/news/growing-hope-plants-lebanon | www.usj.edu.lb
CONTACT Magda Bou Dagher Kharrat | magda.boudagher@usj.edu.lb

"LAND OF EAGLES AND CASTLES"

How to engage local communities in a vision of nature-based tourism

"Local communities are the ones with the strongest ties to the environments in which they live, and success or fail in conservation often depends to a large extent on them."
Mirjan Topi

OVERVIEW

Albania: a magnificent landscape rich in wildlife and ancient historical monuments. Yet, in a land not so rich economically, the Albanian coast is fast facing many threats from unregulated tourism development. Much of Albania has a lack of waste disposal infrastructure and there is limited understanding amongst the people of other nature-related issues including conservation, organic agriculture and sustainable tourism. There are funds for environmental work, but they are hard to access locally by grass roots organisations and their effects not often felt by local people.

PPNEA and BSPB have a vision for the sustainable development of this landscape, based around three Key Biodiversity Areas (KBAs): imagine a coastline where people and nature live in harmony, where there is no litter, and local creative NGOs and communities protect nature because they value it and it brings them direct benefits from nature-based "eco" tourism. Welcome to the future ecotourism hotspot on the Adriatic coast: "Land of Eagles and Castles".

How? An injection of environmentalism using micro-grants.

WHERE
Adriatic coastline, Albania

PROJECT PARTNER
Association for the Protection and Preservation of Natural Environment in Albania (PPNEA) & Bulgarian Society for the Protection of Birds (BSPB)

KEY HABITAT
Three coastal Key Biodiversity Areas (KBAs): 1. Vjosë-Nartë; 2. Vlora Bay, Karaburun & Çika Mountain; 3. Butrinti & surrounding area

VISION
COMMUNITY-DRIVEN
NATURE-BASED TOURISM

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APPROACH
A "MICRO-GRANTS" SCHEME STARTS A CHAIN REACTION
FOR THE ENVIRONMENT THROUGH COMMUNITY "MICRO-PROJECTS"

EXAMPLE MICRO-PROJECTS

PILOT PLASTIC RECYCLING SYSTEM
Created at local school, involving "Recycling Day" when children bring in waste from their homes and sell it to a recycling company – revenues reinvested in outdoor educational trips, books, etc.

TRADITIONAL FLAVOUR
An eco-business employs 10 local women selling traditional food products to tourists at KBA. Stall space very competitive.

HOME STAYS
Ten existing local homes transformed into tourist guesthouses near the entrances to KBAs.

CONSERVATION TRAINING
Site monitoring, socio-economic research, questionnaires, data analysis, bird identification.

NATURE TOURISM INFRA-STRUCTURE
All three KBAs equipped with information boards, marked trails, birdwatching towers, and one new tourism office.

BIRD GUIDE BOOK
First ever complete field guide for Albania's 351 bird species created.

BOAT SERVICE
Local "one man NGO" guide is set to bring birdwatchers to an inaccessible island, instead of hunting/fishing.

MICRO-GRANTS

8
local NGOs granted to implement their own ideas (10% of project budget), and also help distribute further calls for proposals for micro-grants in the community.

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18
people receive 'fellowships' for on-the-job conservation training.

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100s
hundreds of local people involved in different activities over three years.

OVERALL BENEFITS

- A kick-start of sustainable development of the area by showing people the value of alternative livelihoods, with the creation of new nature-friendly sustainable jobs.
- Brand new in-depth socio-economic research on birds has been carried out by community members.
- Local NGOs strengthened with funds that previously they could not access due to language constraints and lack of experience.
- Young people engaged who can continue to contribute in the future.
- By using micro-grants to catalyse change, the overall reach of the project is far greater, and more cost-effective, than it would be if PPNEA and BSPB had tried an environmental awareness campaign themselves.
- Local NGOs help reach deep into the heart of communities, especially to people who would never see micro-grants advertised on a website.
- Micro-grants given directly to community members creates a sense of involvement, ownership and genuine responsibility to guarantee the completion of "their" work.
- Local NGOs work better in their communities than larger NGOs, because they know the right people and have the connections.
- Environment in much better condition – better for wildlife and for attracting ecotourists.

FUTURE

"NATURE-BASED TOURISM IS BRINGING REVENUE TO THE LOCAL COMMUNITIES, WHO ARE PROUD AND AWARE OF THEIR LOCAL NATURAL HERITAGE, AND ARE CHANGING THEIR ATTITUDES AND BEHAVIOR TOWARDS CONSERVING THE ENVIRONMENT."
Mirjan Topi, PPNEA

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LINKS www.naturetouralbania.info CONTACT Mirjan Topi | m.topi@ppnea.org

DESERT ISLAND RISKS

Inspiration to protect remote and difficult places

"We do it for love. There are big challenges, like bringing all freshwater by boat, but we do it because otherwise the turtles, shearwaters and larks will disappear from here."
Patricia Rendall-Rocha, Biosfera

"You have to be flexible, you have to know very well the environment in which you work. So keep your minds open, keep your projects flexible because you will need to change something."
Tommy Melo, Biosfera

OVERVIEW

Piercing sun, dry, rocky ground, and a solitary ex-military canvas tent ripped at the sides by strong Atlantic winds. In the only shade, dust sprays as sparrows can be seen scuffling for water dripping from the tent's fresh water barrel tap. This is the scene on arrival on Raso, an islet too remote for permanent inhabitation, after seven hours of a sea-sickening boat ride. Not the place you'd expect to find the entire population of a Critically Endangered lark, let alone a small passionate team of conservationists there to protect it and other unique endemic species from extinction. On a nearby island, Santa Luzia, a regular flow of international volunteers come to brave isolation and early morning hikes to patrol and conserve a nearby island, Santa Luzia, for nesting loggerhead turtles and seabirds.

A VOLUNTEER FORCE

With a lack of staff and the need to be present on the islands for 4 months a year, Biosfera and SPEA cannot run their lark, seabird and turtle monitoring programmes without volunteers. Generally, people (especially young) are excited to have the opportunity to visit adventurous places otherwise impossible to access, help amazing species, at the same time receive environmental education, and even help motivate NGO staff too. There are benefits to recruiting volunteers from local communities (especially those which previously harmed nature, such as turtle/seabird poachers), and from abroad too (which helps spread messages beyond borders).

WHERE
Santa Luzia, Raso & Branco, Cape Verde

PROJECT PARTNERS
Biosfera, SPEA (Portuguese Society for the Protection of Birds), RSPB (Royal Society for the Protection of Birds)

KEY SPECIES
Cape Verde Shearwater *Calonectris edwardsii* (NT); Loggerhead Turtle *Caretta caretta* (VU); Raso Lark *Alauda razae* (CR)

DESERT ISLAND DEDICATION

LEGEND
- São Vicente › Santa Luzia (5 hours)
- São Vicente › Raso (7 hours)
- Turtles
- Raso Lark
- Shearwaters
- Giant Wall Gecko
- Fishermen
- Volunteer conservation camp

ENGAGING VOLUNTEERS

- Ensure you have meaningful and enriching volunteer positions.
- Give the volunteer programme an exciting name for advertising such as "Desert Island Turtle Camp".
- Have a very clear idea of what you want volunteers to do in what time.
- Ensure everyone is fully aware about the local conditions they have signed up to endure.
- Create certificates for volunteers, and other bonus benefits and opportunities.

TEATIME WITH FISHERMEN

On these isolated islands with no rangers, no-one will know if fishermen are killing turtles and seabirds. Biosfera discovered they were poaching 15,000 shearwaters a year, as well as female turtles and their eggs. Once, Tommy camped out on Raso to protect shearwaters from poachers, and when his food ran out, he risked shark-invested waters to freedive for fish. Now, over tea in the fishermen's shelters on the island, they discuss the environment together.

"Every day, little steps," says Tommy. "Now the fishermen work with us. They help us count the birds, build the turtle hatchery, and adopt nests. It was a big, big change."

"Since we are here, they respect us and our work because they see every day that we are walking, that it is difficult," explains Patricia. "They have established a relationship with us and the turtles and most now know from their hearts not to poach."

FUTURE

"OUR VISION IS A HUGE MARINE PROTECTED AREA IN CAPE VERDE THAT INCLUDES ALL THREE ISLANDS, WITH US AS A GOVERNMENT PARTNER AND THE LINK BETWEEN THEM AND THE FISHERMEN."
Tommy Melo

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LINKS www.birdlife.org/africa/news/winning-hearts-and-minds-cape-verde
YOUTUBE "Biosfera: Protecting the desert islands"
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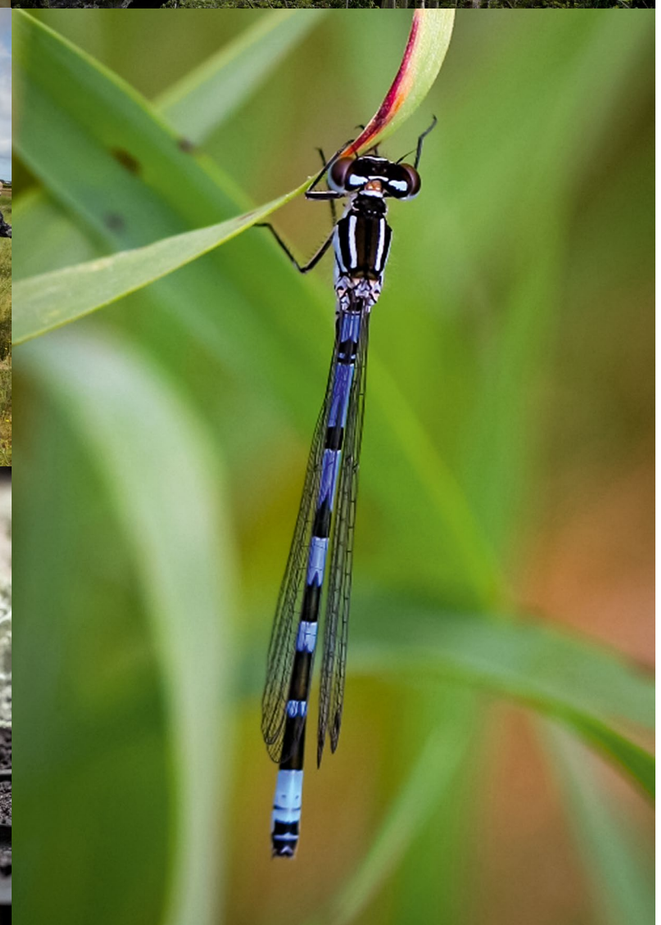

DIVERSE CULTURES, SAME COMMITMENT TO BIODIVERSITY

Perspectives after five years of conservation in the Mediterranean

Political turmoil in the region caused some collateral damage to protected areas and threatened fauna and flora. It also showed us there was a lack of harmony between local people and conservation. **Since we started in the hotspot,** we have contributed to the 180 degree change of conservation from 'protect by punishment' to 'protect by involving more local people and civil society organisations'.

Awatef Abiadh

Programme Officer
North Africa

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At last, I feel now the Middle East is part of the Mediterranean. Despite our cultural, political, and language differences, it turns out everyone faces the same conservation challenges. **CEPF has brought us all together for the first time.** This legacy will bring a long lasting partnership between like-minded organisations to overcome the common challenges ahead.

Sharif Jbour

Programme Officer
Middle East

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Conservation in the Balkans is often fighting not just for nature, but also a complex fight for human rights and against organised crime and high-level corruption. **It is vital to ensure economic alternatives** for local communities and ensure their involvement for any activities on the ground in the Mediterranean to be successful. This is why CEPF is so special.

Borut Rubinič

Programme Officer
Balkans

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Grantees, Regional Implementation Team, CEPF Secretariat and stakeholders at the CEPF Mediterranean Mid-term Assessment in Ulcinj, Montenegro, 2015

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THANKS TO
Gregor & Magdalena Aljančič, Claudia Azafzaf, Rami El-Akhras, Pedro Geraldes, Jamel Jrijer,
Magda Bou Dagher Kharrat, Tommy Melo, Bjanka Prakljačić, Patricia Rendall-Rocha, Mirjan Topi

DESIGN
Andrea Canfora

ISBN
978-0-946888-99-3

PHOTO CREDITS
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RECOMMENDED CITATION
Together: local solutions for nature conservation: lessons from the Mediterranean
Cambridge, UK: BirdLife International (Nov 2016)

This material will be available and enhanced online at
www.birdlife.org/cepf-med

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CEPF IS MORE THAN JUST A FUNDING PROVIDER

A dedicated **Regional Implementation Team (RIT)** (expert officers on the ground) guides funding to the most important areas and to even the smallest of organisations, helps build civil society in the region, and shares learned lessons and best practices such as those featured in this booklet.

In the Mediterranean Basin Biodiversity Hotspot, the **RIT** is entrusted to **BirdLife International** and its national Partners **LPO** and **DOPPS**

TOGETHER FOR BIODIVERSITY IN THE MEDITERRANEAN

GRANTEES

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