



The State of Nature in the EU

Conservation status and trends of species and habitats
protected by the EU Nature directives 2013–2018

Reporting on the State of Nature

Every six years, Member States are asked to report back to the European Commission on the conservation status of those EU protected species and habitats present on their territory. The Commission then pools all the data together, with the help of the European Environment Agency, in order to see how well they are faring across the EU.

The latest State of Nature report for 2013–2018 is the largest and most extensive data-gathering exercise ever undertaken on Europe's nature. As such, it provides an invaluable insight into the impact of the conservation measures taken so far, as well as their main shortcomings.

The report concludes that, while some species and habitats are 'holding the line', the majority continue to have a poor or bad status at the EU level. The multiple pressures they face are simply too great to enable their recovery.

Yet, inspiring success stories are emerging on a regional scale and show what can be achieved through targeted action.

Conservation status and trends – what does it mean?

A number of scientific parameters are used to assess the conservation status (good, poor, bad) of a habitat or species across its natural range in the EU (not just in protected sites). However, because of the high level of data aggregation, a change in conservation status from one reporting period to another (6 years) will only be triggered by a really substantial improvement across most of its range. As a result, improvements at a regional or national level will not be picked up.

Moreover, it may be years before a particular habitat or species is able to expand its range or increase in population across the EU, even if all the conditions are right. That is why the State of Nature report also analyses conservation status trends. These provide important clues as to whether a species and habitat is at least heading in the right direction, i.e. improving, or whether it is remaining stable or continues to decline.

The EU Nature Directives

The EU Birds and Habitats Directives are the cornerstones of the EU's biodiversity policy. Together, they aim to conserve around 2000 rare, endangered and vulnerable species and a further 230 habitat types, deemed of European importance.

The overall objective is to ensure that these species and habitats are restored to, or maintained in, a favourable conservation status across their entire natural range within the European Union. This requires more than just halting their further decline or disappearance; the aim is to ensure that they recover sufficiently to be able to survive over the long term across their natural range. This can only be achieved if all EU Member States work together.

EU protected species and habitats

The Habitats Directive	Total N°
Vascular Plants	650
Fish	203
Mammals	141
Arthropods (eg butterflies, moths, dragonflies, beetles...)	129
Reptiles	106
Amphibians	71
Molluscs	48
Non vascular plants	37
Other invertebrates	4
Habitat types	233

The Birds Directive	Total N°
All naturally occurring wild bird species in the EU	463
Annex I: (sub) species requiring designation of special protection areas	197
Annex II: (sub) species that may be hunted under national legislation	86

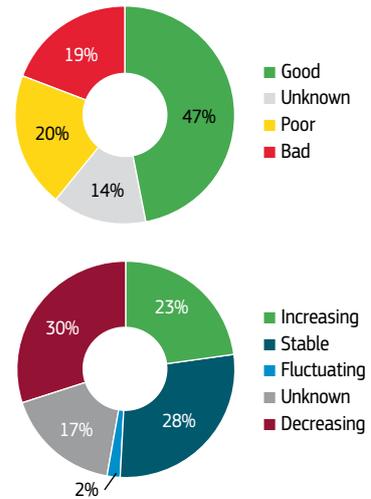
Current conservation status and future trends

Birds

The report shows that almost half of all European wild bird species (47%) have a good population status and are holding the line, despite the immense pressures they continue to face. On the other hand, around 39% have a poor or bad status.

Looking at their short-term trends, around a quarter (23%) of species show signs of improvement but, for the remainder, the trend is either stable (28%) or pointing towards a continued downward spiral (30%).

Above: EU Population status for birds in 2020
Below: Short term (12 years) breeding bird population trends at EU level

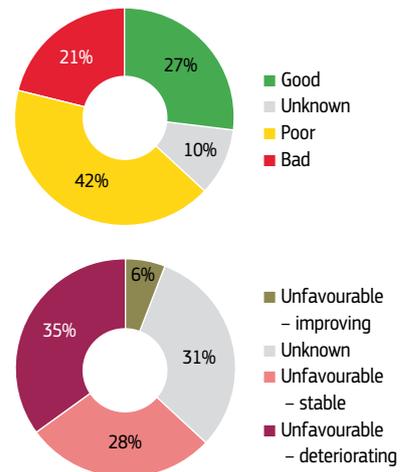


Other animals

Around a quarter of the species (27%) listed in the Habitats Directive have a good conservation status. Nevertheless, the majority (63%) still have a poor or bad conservation status. Data on marine species remains largely incomplete, even for well-known species such as cetaceans and marine turtles.

Looking at species with a poor or bad status, it can be seen that only 6% show an improving trend while 35% are deteriorating further, which is a cause for concern. It points to the fact that existing pressures are still too strong to allow their recovery.

Above: Conservation status of species at EU level
Below: Conservation status trends of species with unfavourable (i.e. not-good) or unknown status at EU level

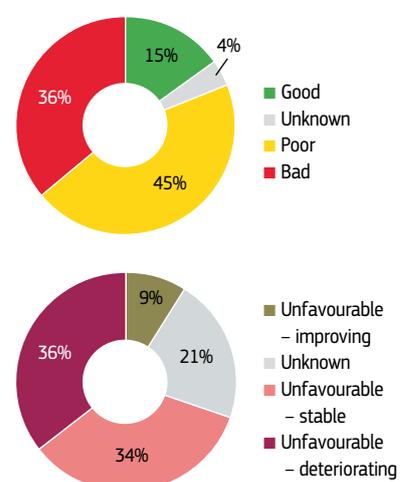


Habitat types

The overwhelming majority of habitats have a poor or bad conservation status (81%), with no more than 15% of habitats showing a good status.

Looking at the trends of habitats with a poor or bad status, it can be seen that only 9% show an increasing trend. The trend remains stable for 34% of the habitats but continues to decline for a further 36%. For 21% of habitats the trend is simply not known.

Above: Conservation status of habitats at EU level
Below: Conservation trends of shabitats with unfavourable (i.e. not-good) or unknown status at EU level



The state of nature in the EU

Examples of species and habitats that are improving, decreasing or remaining stable at the EU (in case of birds) or biogeographical level



The biogeographical and marine regions of the European Union

- Alpine
- Atlantic
- Black Sea
- Boreal
- Continental
- Macaronesian
- Mediterranean
- Pannonian
- Steppic
- Marine Atlantic
- Marine Baltic
- Marine Black Sea
- Marine Macaronesian
- Marine Mediterranean
- Overlapping submissions to UNCLOS

NB: The United Kingdom withdrew from the European Union as of 1 February 2020, but State of Nature covers the period 2013–2018 and so also includes data from the UK



Red throated diver
Gavia stellata



Woodlark
Lullula arborea



European green toad
Bufotis viridis



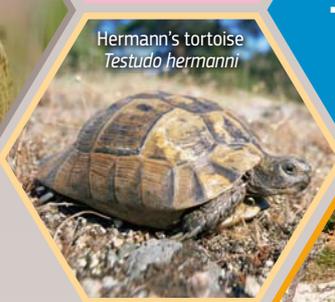
Beaver
Castor fiber



Sand Lizard
Lacerta agilis



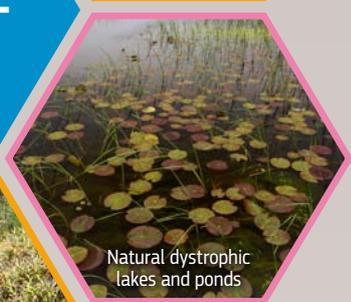
Bittern
Botaurus stellaris



Hermann's tortoise
Testudo hermanni



→ STABLE ←



Natural dystrophic lakes and ponds



Sarcopoterium spinosum
phryganas



Swift
Apus apus



Hazel grouse
Bonasia bonasia



Lanner Falcon
Falco biarmicus



Green hawker
Aeshna viridis



Freshwater pearl mussel
Margaritifera margaritifera



↓
DECREASING
↓



European sturgeon
Acipenser sturio



Northern Atlantic wet heaths with
Erica tetralix



Mountain hay meadows



Key pressures and threats on Europe's nature

Over the centuries, European society has had a profound impact on nature, both in the good and bad sense. Thanks to its long history of land-use, a diverse patchwork of semi-natural habitats and cultural landscapes has emerged that is exceptionally biodiversity rich.

However, during the 20th century, human activities increased to such an extent that it resulted in a large-scale loss and destruction of nature, particularly through the combined effects of agricultural intensification, infrastructure developments, pollution and urban expansion.

For the State of Nature report Member States were asked to report on the current main causes of wildlife loss and habitat degradation.

From this it can be seen that agriculture remains the most frequently reported pressure on both habitats and species. This reflects not only the scale of agricultural land use in the EU but also continuing changes in farming practices. As a result, only 8% of agricultural habitats show an improving trend, whereas 45% are deteriorating.

Other major pressures include urbanization, forestry and alterations to freshwater habitats. Pollution, species exploitation, invasive alien species and climate change are also significant.

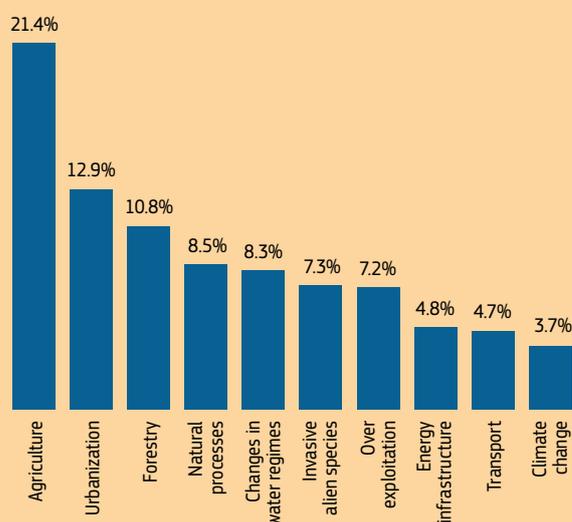
*Common farmland species like the Skylark, *Alauda arvensis* are declining across the EU.*



Examples of the key pressures on habitats and species:

- **Agriculture:** abandonment of farmland, agricultural intensification or conversion from one type to another, pollution and removal of small landscape features.
- **Urbanisation:** outdoor sports, recreation and tourism, spread of urban areas, new infrastructures or expansion of existing facilities.
- **Forestry:** removal of dead, dying and old trees, clear-cutting and the conversion to other types of forests or land uses.
- **Natural processes:** natural succession, interspecies competition or predation, abiotic pressures.
- **Changes in water regimes:** hydrological dams, the drainage of wetlands, groundwater abstraction and physical alterations to water bodies.
- **Alien (problematic) species:** competition with native species for food and habitats.
- **Exploitation of species:** illegal shooting and killing of wildlife, overhunting, over fishing, over harvesting, accidental bycatch in fishing nets.
- **Climate change:** droughts and decrease in precipitation, temperature changes, increases in changes in precipitation, changes in sea level and wave exposure.

Reported frequency of high ranking pressures (in %)



Role of Natura 2000 network



At the heart of the two Nature Directives lies a EU-wide ecological network of nature conservation areas – called the Natura 2000 network. Almost 28,000 sites have been included so far. They cover almost a fifth of Europe's land area (18%) and around 10% of the surrounding seas, making it the largest coordinated network of protected areas anywhere in the world.

Once designated, Member States are duty bound to prevent any further deterioration of the habitats and species for which the site has been designated. They must also introduce positive conservation measures to improve their condition within these Natura 2000 sites.

The *State of Nature* report reveals that species and habitats are, on average, more likely to have a good conservation status if their habitat area or EU population is well represented within the Natura 2000 network. Those with more than three quarters of their resource in the network are generally faring better than those that are only partly included. Bogs, mires, fens and dunes, in particular, have benefitted from being protected by Natura 2000.

However, despite these positive signs, it is clear that the full potential of the Natura 2000 network has yet to be unlocked. Only a proportion of the Natura 2000 sites have management plans in place and most of the conservation measures taken so far have been to maintain the current status or prevent further deterioration, rather than actively improve their conservation state.

Lowland hay meadows are a haven for pollinators and other wildlife if properly managed.

A valuable economic asset

The Natura 2000 Network not only protects biodiversity, it also provides society with a wealth of valuable ecosystem services, such as fresh water, carbon storage, pollinating insects etc., protection against floods, avalanches and coastal erosion, as well as ample opportunities for tourism and recreation. The benefits that flow from the Natura 2000 network alone are estimated to be worth in the order of €200 to €300 billion/year. Investing in Natura 2000 therefore makes sound economic sense.

The role of the EU LIFE Programme

Adopted in 1992 at the same time as the Habitats Directive, the EU LIFE programme has been supporting nature conservation projects across the EU ever since. To date, LIFE has co-financed some 1,800 projects to the tune of almost € 3 billion in order to help restore protected habitats and protect species across the EU. In many cases, this has had a direct impact on their conservation status at a local or regional level.

LIFE projects have also been instrumental in raising awareness of Natura 2000, having actively engaged thousands of stakeholders and members of civil society in their protection and management. A truly impressive achievement for what remains a very small fund, representing less than 1% of the EU budget.



The new EU Biodiversity Strategy to 2030

In May 2020, the Commission published its new EU Biodiversity Strategy to 2030, which outlines a series of ambitious commitments for the coming decade. Amongst others, the new strategy calls for the legal protection of at least 30% of the EU's land and sea area. 10% of this must be strictly protected, including all remaining primary and old growth forests. All protected sites must also be effectively managed by 2030 and a new Nature Restoration Plan put in place by 2021, with legally binding targets.

The Biodiversity Strategy also commits to ensuring that, by 2030, there is no further deterioration in any habitats and species listed in the Nature Directives, and that there is a positive strong trend for at least 30% of those in poor or bad state.

The two EU nature Directives are central to reaching the objectives of the Strategy. But for them to reach

their full potential, conservation efforts must be redoubled and a concerted restoration programme launched for Natura 2000 sites. This must be accompanied by significantly greater financial support and a better integration of biodiversity needs into other EU land and water-use policies in the future.

Restoration needs for habitats

The State of Nature report estimates that 215 000 km² (an area almost the size of Romania) of habitats protected under the Habitats Directive need to be restored or actively recreated. This is especially important for forests, grasslands, bogs, mires and fens, as well as coastal habitats, all of which can also play a major role in mitigating the effects of climate change.



The Merganser, Mergus merganser with chicks, has a good status in the EU.

Further reading:

- Commission's report on State of Nature (2013-2018): https://ec.europa.eu/environment/nature/knowledge/rep_habitats/index_en.htm
- EEA Report | No 10/2020 (technical report): <https://www.eea.europa.eu/themes/biodiversity/state-of-nature-in-the-eu/state-of-nature-2020>
- LIFE report "Bringing back nature through LIFE": https://ec.europa.eu/easme/sites/easme-site/files/bringing_nature_back_through_life.pdf
- A searchable data base on the status and trends of individuals species and habitats under the Habitats Directive: <https://nature-art17.eionet.europa.eu/article17/> and under the Birds Directive <https://nature-art12.eionet.europa.eu/article12/>

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Print ISBN 978-92-76-22786-1 KH-01-20-581-EN-C

PDF ISBN 978-92-76-22785-4 KH-01-20-581-EN-N



Publications Office
of the European Union