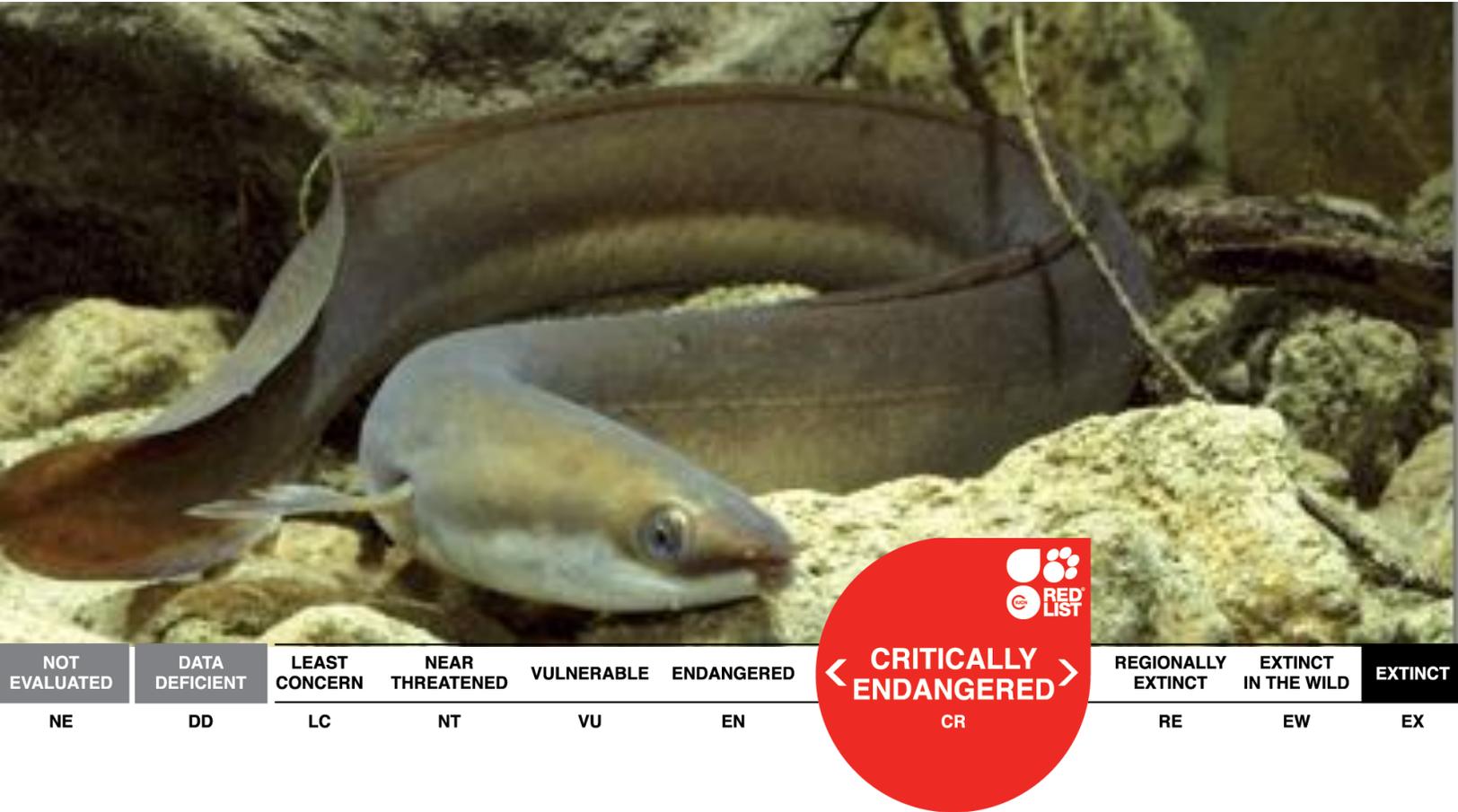


# Ireland's biodiversity at risk

A call for action



NOT EVALUATED	DATA DEFICIENT	LEAST CONCERN	NEAR THREATENED	VULNERABLE	ENDANGERED	CRITICALLY ENDANGERED	REGIONALLY EXTINCT	EXTINCT IN THE WILD	EXTINCT
NE	DD	LC	NT	VU	EN	CR	RE	EW	EX

Ireland hosts a large proportion of the species that are threatened at the European level, and has the important responsibility for protecting these species within its territory. Species in Ireland require greater action to improve their status. While many species already receive some conservation attention, others do not. Species can be saved from extinction but this requires a combination of sound research and carefully coordinated efforts. Ireland as an EU Member State has committed to halting biodiversity loss by 2020 but urgent action is needed to meet this target and better monitoring capacity is required to measure if the target is met.

Considerable conservation investment is needed from Ireland to ensure that the status of European species improves in the long term. This document provides an overview of the conservation status of species in Ireland based on the results of all European Red Lists completed to date. It does not provide the status of the species in the country, therefore we invite the reader to cross check national and sub-national Red Lists. Together, they can be used to help guide policies and local conservation strategies.

## The European Red List

The European Red List of Species is a review of the conservation status of more than 6,000 species in Europe according to the IUCN Red List Categories and Criteria and the regional Red Listing guidelines. It identifies species that are threatened with extinction at the European level so that appropriate conservation actions can be taken to improve their status. The geographical scope is continent-wide, including European parts of the Russian Federation and Turkey as well as the Macaronesian Islands. The Caucasus region is not included.

To date, European regional assessments have been completed for all mammals, reptiles, amphibians, butterflies, dragonflies, freshwater fishes and freshwater molluscs and a selection of saproxylic beetles, terrestrial molluscs, and vascular plants. Assessments of pollinators, medicinal plants, birds and marine fishes are currently under development.

The European Red List is compiled by IUCN Global Species Programme, with funding from the European Commission.

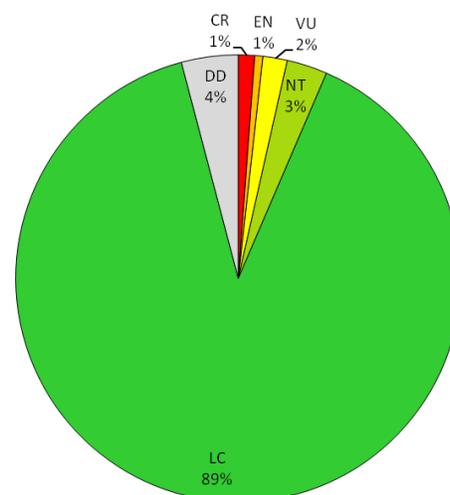
## Conservation status

Ireland is host to an estimated 31,000 species of animals and plants. This number represents 20% of the total species described for Europe and could represent more than 2% of the species in the world. According to the table below, approximately 9% of the species assessed by the European Red List of Species are present in Ireland. For some of the taxonomic groups, the percentages of European species that occur in Ireland are particularly high; such as mammals, dragonflies and vascular plants.

Of the 509 species assessed that occur in Ireland, the groups comprising the highest number of species are vascular plants, freshwater molluscs and mammals. Of the total number of species assessed in the country 4%\* are considered threatened at the European level and at least 3% are Near Threatened. Many of these species are endemic to Europe and are found nowhere else in the world.

Species that are considered threatened at the European level and occur in Ireland are found mostly in wetlands and marine ecosystems. These ecosystems require particular attention in order to ensure the habitats of these sensitive species remain.

European status of species in Ireland



Number of species assessed within each IUCN Red List category at the European level

Species group	No. of sp. in Europe	No. of sp. in Ireland	% of European sp. occurring in Ireland	No. of threatened sp. in Ireland (status at European level)		
				CR	EN	VU
Mammals	233	46	20%	1	2	2
Reptiles	140	1	1%	0	0	0
Amphibians	83	3	4%	0	0	0
Freshwater fishes	522	34	7%	4	1	3
Butterflies	435	31	7%	0	0	1
Dragonflies	137	25	18%	0	0	0
Saproxylic beetles**	431	12	3%	0	0	0
Terrestrial molluscs**	1,233	36	3%	0	0	2
Freshwater molluscs	854	58	7%	1	0	0
Vascular plants**	1,826	263	14%	0	0	1
<b>TOTAL</b>	<b>5,894</b>	<b>509</b>	<b>9%</b>	<b>6</b>	<b>3</b>	<b>9</b>

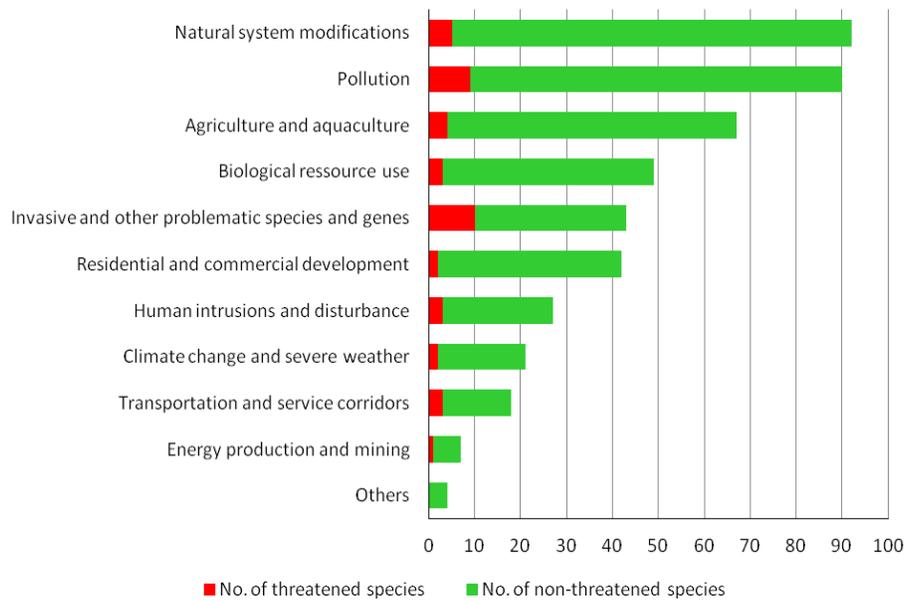
\*\*Not comprehensively assessed, selected species only.

This table does not include the Not Applicable (NA) species in Europe (species introduced after AD 1500 or species of marginal occurrence). The data are based on the results of the European Red List (European region wide assessment).

## Major threats

Habitat loss, fragmentation and degradation are the most significant threats at the European level to species that occurs in Ireland. For freshwater species, major threats include the over-extraction of water, pollution caused by agricultural, forestry and domestic effluents and the introduction of alien species. Other major threats come from changes in water quality, farming and ranching as a result of agricultural expansion and intensification, urbanization and tourism, and the consumptive use of natural resources.

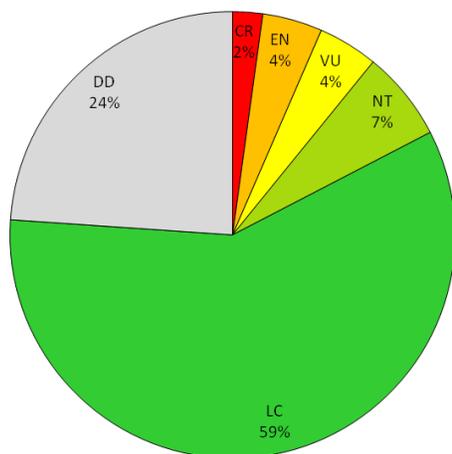
### Major threats at the European level to species occurring in Ireland



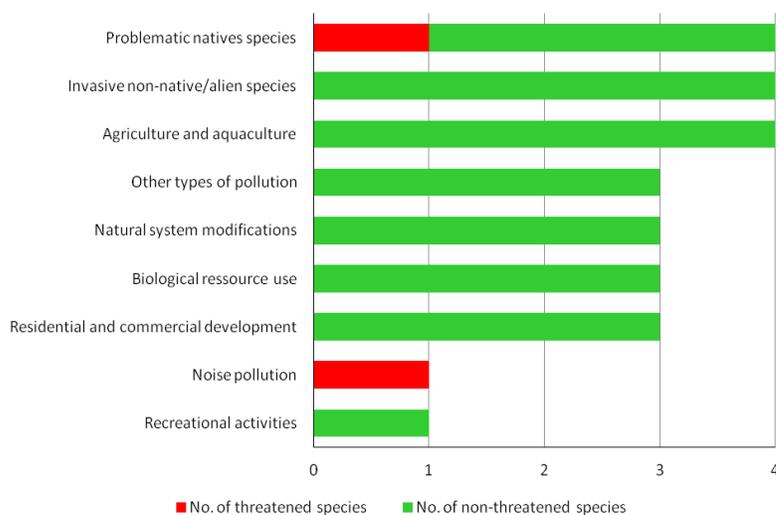
## Mammals

Ireland hosts 20% of all the mammals that occur in Europe. Of these 46 species of mammals, 14%\* are threatened at the European level and an additional 7% are considered Near Threatened. The major threats at the European level that can possibly (or potentially) affect mammals in Ireland are invasive and other problematic species, both native and non-native. Mammal populations are also highly threatened mainly by farming activities and residential development. Pollution, hunting, trapping, logging and wood harvesting also pose serious threats to mammals in the country.

Status at European level



Threats at European level



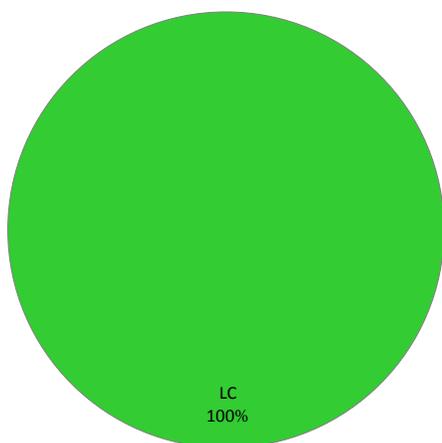
## Reptiles

There is only one reptile species in Ireland, *Zootoca vivipara*. This species is classified as Least Concern at the European level. The main threat to this species at the European level is habitat loss due to residential and commercial development and farming.

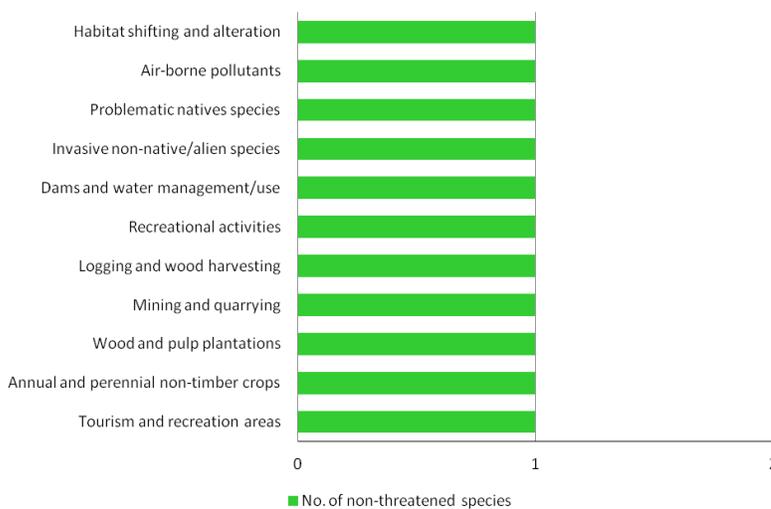
## Amphibians

Amphibians in Ireland represent 4% of all amphibians occurring in Europe. The conservation status of amphibian species that occur in Ireland based on the European Red List data is relatively good since none of the species present in the country are listed under a threatened category and all are classified as Least Concern. The main threats to this group at the European level are invasive and other problematic species, both native and non native. Other major threats include pollution, logging and wood harvesting, dam construction and habitat changes due to climate change.

**Status at European level**



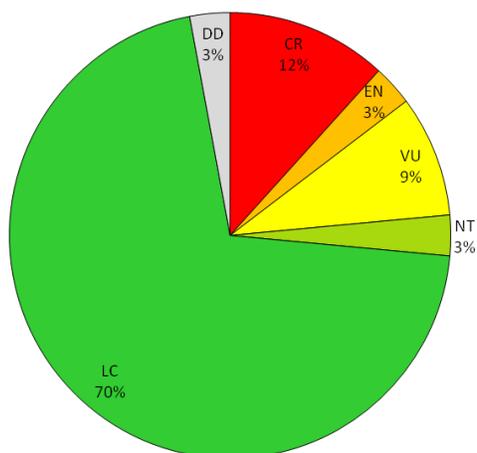
**Threats at European level**



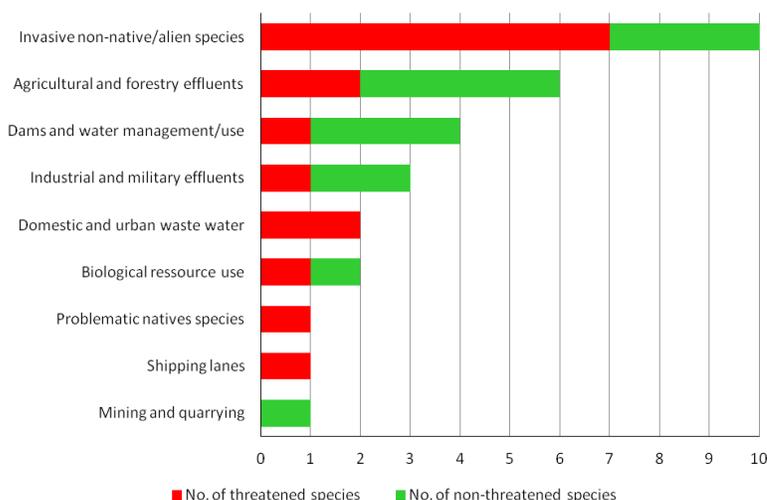
## Freshwater fishes

Freshwater fishes are one of the most threatened groups at the European level. Twenty-four percent\* of the species that occur in Ireland are threatened at the European level, while the percentage of total threatened species that is observed in the European region is 40%\*. Additionally, freshwater fishes have a high percentage of endemism in the European region: up to 80%. A centre of endemism exists in postglacial lakes in Ireland. The most important threat to this group at the European level is invasive non-native species. Other threats for this species include water pollution caused by agricultural effluents and modification of the physical and chemical characteristics of freshwater rivers and lakes due to dam construction.

**Status at European level**



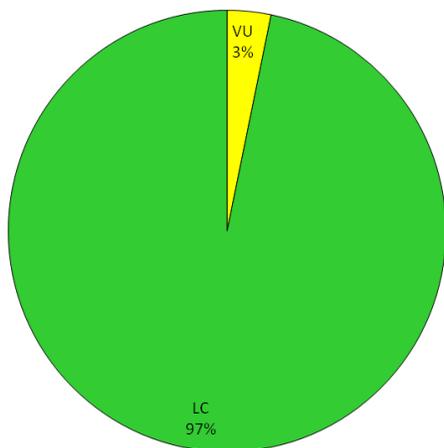
**Threats at European level**



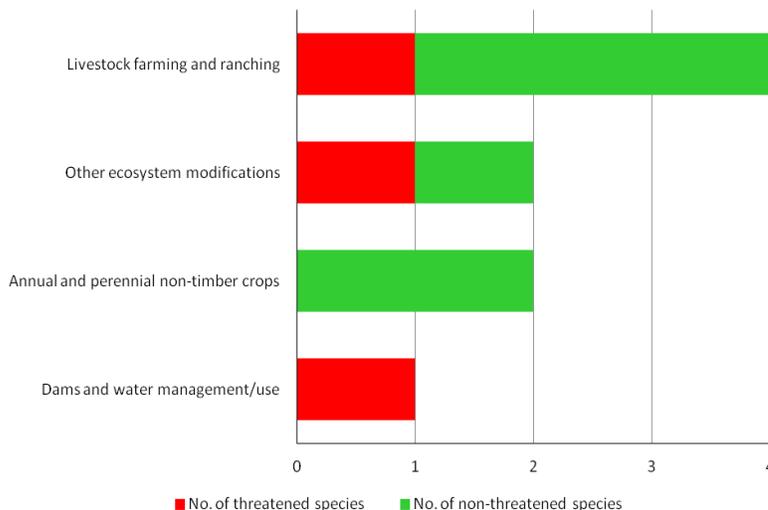
## Butterflies

Ireland hosts 7% of all butterfly species in Europe and 3%\* of them are considered threatened at the European level. The conservation status of butterflies in Ireland based on the European Red List data is relatively good since approximately 97% of the species are classified as Least Concern. However, butterflies have very specific food and habitat requirements at different stages of their life cycle so they are very sensitive to changes in their environment. The major threat to this species is habitat loss due to livestock farming and ranching, and habitat management such as overgrazing, undergrazing or changes in forestry practices.

**Status at European level**



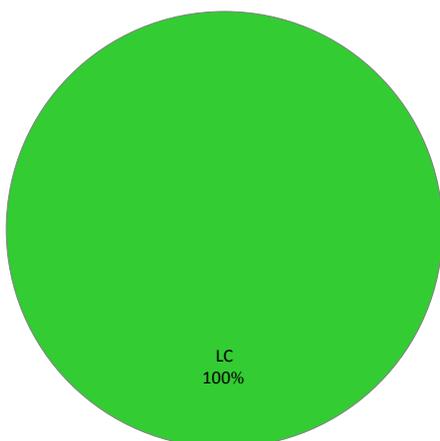
**Threats at European level**



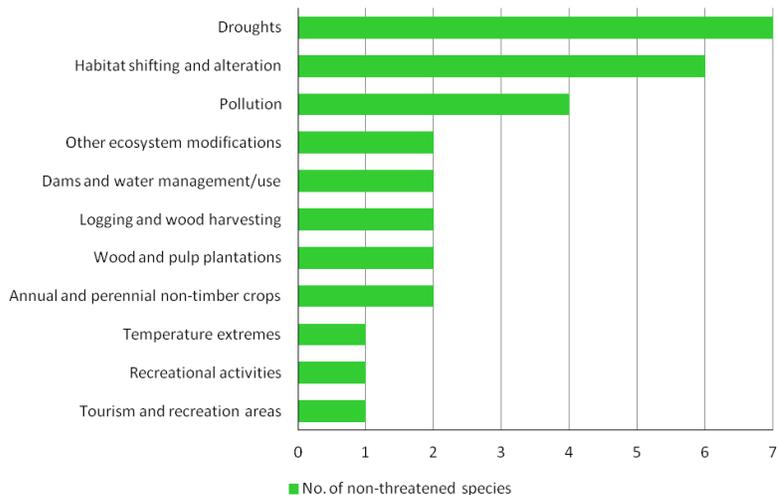
## Dragonflies

Eighteen percent of all the dragonflies in Europe are present in Ireland. The conservation status of dragonflies in Ireland based on the European Red List data is relatively good since all the species are classified as Least Concern. This group is adversely affected by desiccation caused by dry weather, fires and increased water extraction for irrigation and human consumption. River species are also affected by ecosystem modifications such as the construction of dams and reservoirs and water quality deterioration.

**Status at European level**



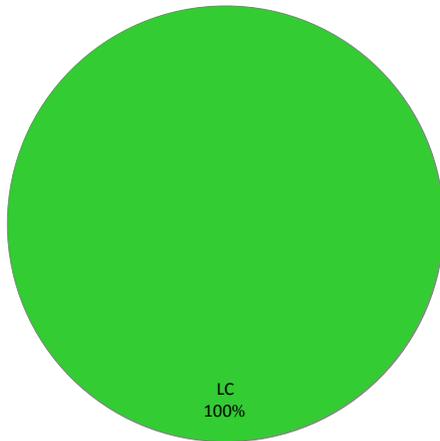
**Threats at European level**



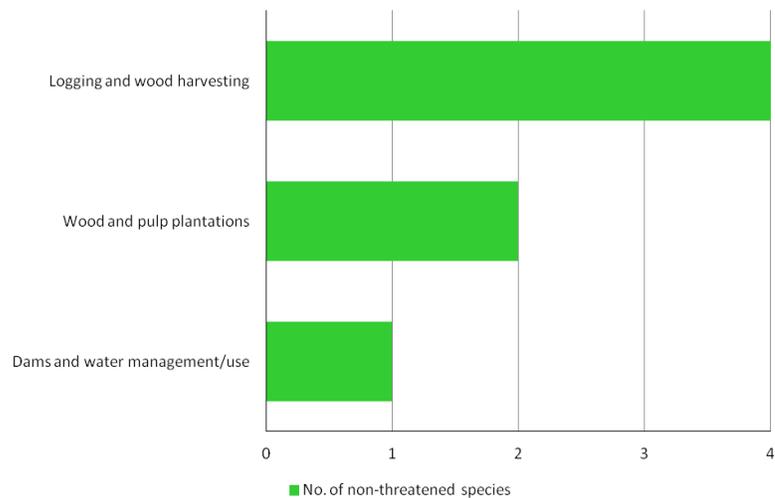
## Saproxylic beetles

Three percent of the beetle species assessed by the European Red List are present in Ireland. The conservation status of saproxylic beetles in Ireland based on the European Red List data is relatively good since all the species are classified as Least Concern. The species in this group are very dependent on the dynamics of tree aging and wood decay processes. The major threat to this group is logging and wood harvesting; therefore these beetles require sensitive conservation management of tree populations irrespective of their situation.

Status at European level



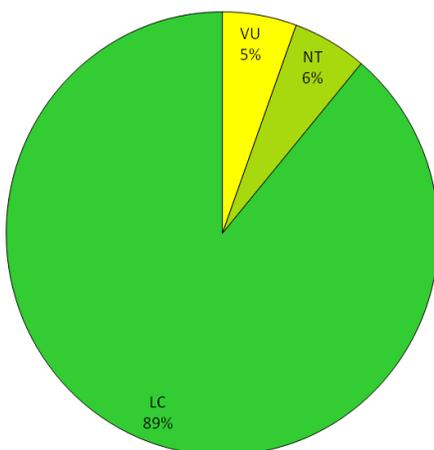
Threats at European level



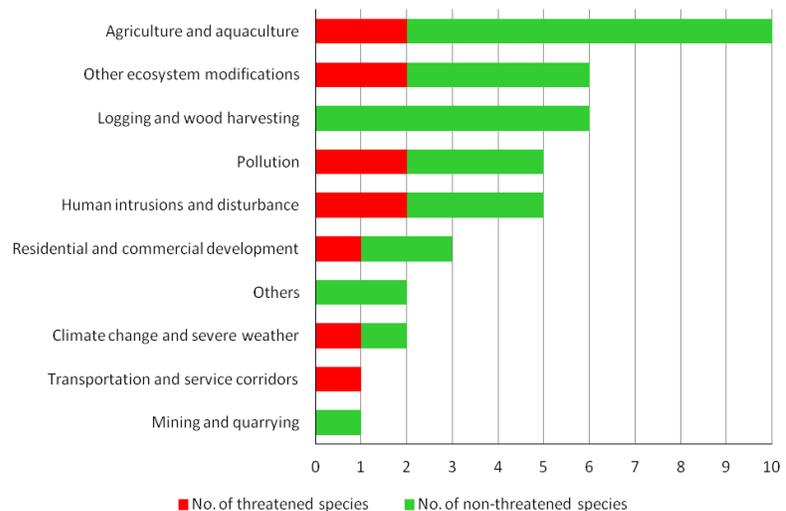
## Terrestrial molluscs

Six percent\* of the terrestrial molluscs assessed that are present in Ireland are threatened and 6% are Near Threatened at the European level. The major threat to this group at the European level is the loss and degradation of suitable habitat mainly due to livestock farming and ranching. Logging and wood harvesting, habitat changes due to habitat management, pollution and human intrusions also pose threats to this group.

Status at European level



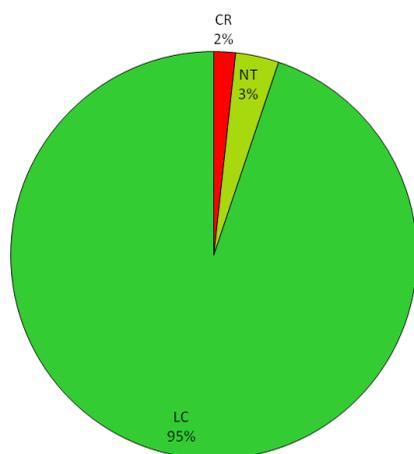
Threats at European level



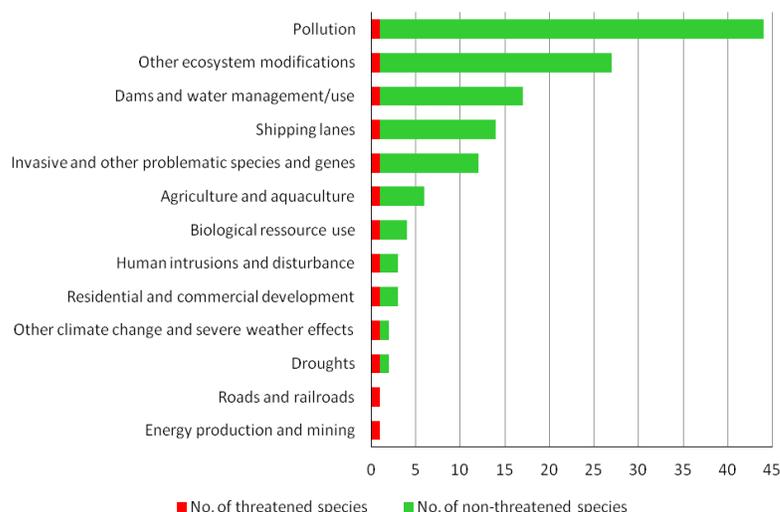
## Freshwater molluscs

Two percent\* of the freshwater molluscs assessed that are present in Ireland are threatened at the European level. Declining water quality in freshwater rivers and lakes caused by agricultural activities is one of the major threats at the European level. Habitat loss and degradation due to habitat management, dams construction and water abstraction are also main threats to this group.

Status at European level



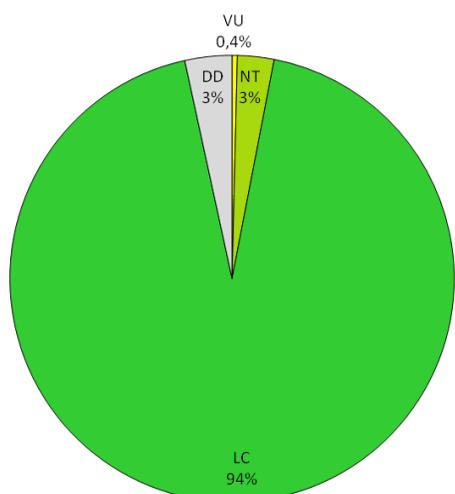
Threats at European level



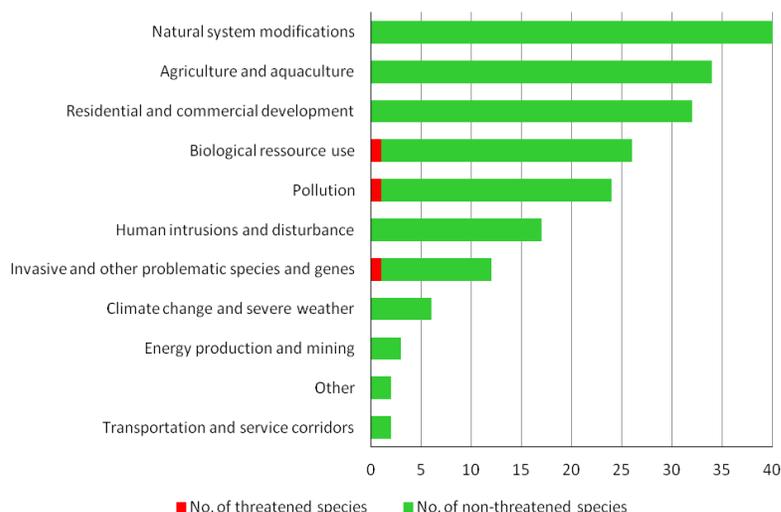
## Vascular plants

At European level, priority crop wild relatives, aquatic plants and all species included in the annexes of the Habitats Directive, Bern Convention and CITES have been assessed. A total of 263 species are found in Ireland, which represent 14% of the total of species assessed in Europe. Ireland is also one of the countries that have a high number of endemics. Less than 1%\* of the 263 vascular plant species assessed in Ireland are considered threatened at the European level. For terrestrial plants, intensified livestock farming, especially intensive grazing activities have the worst impacts. For aquatic species, direct habitat loss caused by draining for development, agriculture and pasture is the main threat.

Status at European level



Threats at European level





## INTERNATIONAL UNION FOR CONSERVATION OF NATURE © May 2013

Document prepared by Andrea Pino del Carpio, Silvia Sánchez, Ana Nieto and Melanie Bilz  
European Union Representative Office  
Boulevard Louis Schmidt 64  
1040 Brussels, Belgium  
+32 2 739 03 13

For more information please contact: [ana.nieto@iucn.org](mailto:ana.nieto@iucn.org)

<http://ec.europa.eu/environment/nature/conservation/species/redlist> and  
<http://www.iucnredlist.org/europe>

The European Red List is a project funded by the European Commission.  
Cover photo by Wolfgang Hauer (*Anguilla Anguilla*)

## REFERENCES

- Bilz, M., Kell, S. P., Maxted, N. and Lansdown, R.V. 2011. *European Red List of Vascular Plants*. Publications Office of the European Union, Luxembourg.
- Cox, N.A. and Temple, H.J. 2009. *European Red List of Reptiles*. Office for Official Publications of the European Communities, Luxembourg.
- Cuttelod, A., Sheddon, M and E. Neubert. 2011. *European Red List of Non-marine Molluscs*. Publications Office of the European Union, Luxembourg.
- Freyhof, J. and Brooks, E. 2011. *European Red List of Freshwater Fishes*. Publications Office of the European Union, Luxembourg.
- Kalkman, V.J., Boudot, J-P., Bernard, R., Conze, K-J., De Knijf, G., Dyatlova, E., Ferreira, S., Jović, M., Ott, J., Riservato, E. and Sahlén, G. 2010. *European Red List of Dragonflies*. Office for Official Publications of the European Communities, Luxembourg.
- Nieto, A and Alexander, K.N.A. 2009 *European Red List of Saproxyllic Beetles*. Office for Official Publications of the European Communities, Luxembourg.
- van Swaay, C., Cuttelod, A., Collins, S., Maes, D., López Manguira, M., Šašić, M., Settele, J., Verovnik, R., Verstrael, T., Warren, M., Wiemers, M. and Wynhoff, I. 2010. *European Red List of Butterflies*. Office for Official Publications of the European Communities, Luxembourg.
- Temple, H.J. and Terry, A. 2009. *The status and distribution of European mammals*. Office for Official Publications of the European Communities, Luxembourg.
- Temple, H.J. and Cox, N.A. 2009. *European Red List of Amphibians*. Office for Official Publications of the European Communities, Luxembourg.

\*The proportion of threatened species in this document is calculated as follows: (EW + CR + EN + VU) / (total number of species assessed - EX - RE - DD). Since the number of threatened species is often uncertain because it is not known whether DD species are actually threatened or not, this formula considers that DD species are equally threatened as data sufficient species.