Strix nebulosa -- Forster, 1772

ANIMALIA -- CHORDATA -- AVES -- STRIGIFORMES -- STRIGIDAE

Common names: Great Grey Owl; Great Gray Owl

European Red List Assessment

European Red List Status
LC -- Least Concern, (IUCN version 3.1)

Assessment Information

Year published:	2015
Date assessed:	2015-03-31
Assessor(s):	BirdLife International
Reviewer(s):	Symes, A.
Compiler(s):	Ashpole, J., Burfield, I., Ieronymidou, C., Pople, R., Wheatley, H. & Wright, L.

Assessment Rationale

European regional assessment: Least Concern (LC)
EU27 regional assessment: Least Concern (LC)

In Europe this species has an extremely large range, and hence does not approach the thresholds for Vulnerable under the range size criterion (Extent of Occurrence 10% in ten years or three generations, or with a specified population structure). The population trend appears to be increasing, and hence the species does not approach the thresholds for Vulnerable under the population trend criterion (30% decline over ten years or three generations). For these reasons the species is evaluated as Least Concern in Europe.

Within the EU27 this species has a very large range, and hence does not approach the thresholds for Vulnerable under the range size criterion (Extent of Occurrence 10% in ten years or three generations, or with a specified population structure). Despite the fact that the population trend appears to be decreasing, the decline is not believed to be sufficiently rapid to approach the thresholds for Vulnerable under the population trend criterion (30% decline over ten years or three generations). For these reasons the species is evaluated as Least Concern in the EU27.

Occurrence

Countries/Territories of Occurrence

Native:

Belarus; Finland; Latvia; Lithuania; Norway; Russian Federation; Sweden; Ukraine

Vagrant:

Germany; Poland

Population

The European population is estimated at 1,900-7,500 pairs, which equates to 3,900-15,000 mature individuals. The population in the EU27 is estimated at 300-2,700 pairs, which equates to 600-5,400 mature individuals. For details of national estimates, see Supplementary PDF.

Trend

In Europe the population size is estimated to be increasing. In the EU27 the population size is estimated to be decreasing by less than 25% in 27.9 years (three generations). For details of national estimates, see Supplementary PDF.

Habitats and Ecology

This species inhabits dense boreal or coniferous forest. It favours areas with openings; taiga interspersed with sphagnum bogs, muskeg or open fields; pine and fir forest adjacent to montane meadows; and tamarack, black spruce and aspen forest. It occasionally uses other habitats outside the breeding season, sometimes near habitation.

The breeding season is from March to August and the species is monogamous. It lays normally three to five eggs although clutches can range from two to nine depending on food availability. It lays in the abandoned

nests of other birds of prey, on broken tree snags, sometimes on a mistletoe broom, or rarely in a shallow depression at the foot of a tree. In addition it will also use artificial platforms. No material added is added to the nest site (Holt *et al.* 1999). It feeds mostly on small mammals, particularly voles, but also takes shrews, squirrels, small hares, lemmings, birds, frogs and beetles (König 2008). In general the species is resident and nomadic; however movement patterns can be variable and are influenced by prey (Holt *et al.* 1999).

Habitats & Altitude

Habitat (level 1 - level 2)		Importance	Occurrence
Artificial/Terrestrial - Pastureland		marginal	non-breeding
Forest - Boreal		major	resident
Grassland - Subarctic		suitable	resident
Shrubland - Boreal		suitable	resident
Wetlands (inland) - Bogs, Marshes, Swamps, Fens, Peatlands		suitable	resident
Altitude	max. 1000 m	Occasional altitudinal limits	

Threats

The species is affected by global warming, which if it persists will continue to move the species's range northwards (Hagemeijer and Blair 1997). Populations fluctuate in line with vole numbers (Cornulier *et al.* 2013). Locally, hunting may still be a threat (König 2008). It is also vulnerable to road traffic collisions and loss of habitat from forestry (Holt *et al.* 1999). Collisions with power lines and cables are also a threat.

Threats & Impacts

Threat (level 1)	Threat (level 2)	Impact and Stresses			
Agriculture & aquaculture	Agro-industry plantations	**Timing**	**Scope**	**Severity**	**Impact**
		Ongoing	Minority (<50%)	Slow, Significant Declines	Low Impact
		Stresses			
		Ecosystem conversion; Ecosystem degradation			
Biological resource use	Hunting & trapping terrestrial animals (intentional use - species is the target)	**Timing**	**Scope**	**Severity**	**Impact**
		Ongoing	Minority (<50%)	Negligible declines	Low Impact
		Stresses			
		Species mortality			
Climate change & severe weather	Habitat shifting & alteration	**Timing**	**Scope**	**Severity**	**Impact**
		Ongoing	Whole (>90%)	Unknown	Unknown
		Stresses			
		Ecosystem degradation; Indirect ecosystem effects			
Transportation & service corridors	Roads & railroads	**Timing**	**Scope**	**Severity**	**Impact**
		Ongoing	Minority (<50%)	Negligible declines	Low Impact
		Stresses			
		Species mortality			
Transportation & service corridors	Utility & service lines	**Timing**	**Scope**	**Severity**	**Impact**
		Ongoing	Minority (<50%)	Negligible declines	Low Impact
		Stresses			
		Species mortality			

Conservation

Conservation Actions Underway

CITES Appendix II. Bern Convention Appendix II. EU Birds Directive Annex I. The species is fully protected from hunting throughout its range and the provision of artificial nesting platforms has proved successful in Sweden. The species is reasonably well studied (König 2008).

Conservation Actions Proposed

Its forest habitat should be protected from clearfelling, acid rain, mining and other developments (Hagemeijer and Blair 1997). The provision of nest platforms may continue to help the species locally. Further research should focus on its relationship with other members of the genus *Strix* (König 2008).

Bibliography

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Hagemeijer, W.J.M. and Blair, M.J. 1997. *The EBCC Atlas of European Breeding Birds: Their Distribution and Abundance*. T & A D Poyser, London.

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Map (see overleaf)

Strix nebulosa

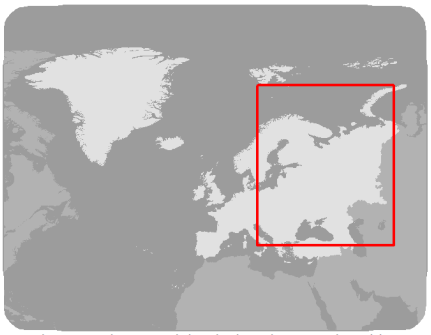
NE | DD | LC LEAST CONCERN | NT | VU | EN | CR | EW | EX

Range

Extant (resident)

Citation:
BirdLife International (2015)
European Red List of Birds

Map created 05/13/2015



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