

***Polysticta stelleri* (Steller's Eider)**

European Red List of Birds

Supplementary Material

The European Union (EU28) Red List assessments were based principally on the official data reported by EU Member States to the European Commission under Article 12 of the Birds Directive in 2019-20. For the European Red List assessments, similar data were sourced from BirdLife Partners and other collaborating experts in other European countries and territories. For more information, see BirdLife International (2021).

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Recommended citation

BirdLife International (2021) European Red List of Birds. Luxembourg: Publications Office of the European Union.

Further information

<http://datazone.birdlife.org/info/euroredlist>
<http://www.birdlife.org/europe-and-central-asia/european-red-list-birds-0>
<http://www.iucnredlist.org/regions/europe>
<http://ec.europa.eu/environment/nature/conservation/species/redlist/>

Data requests and feedback

To request access to these data in electronic format, provide new information, correct any errors or provide feedback, please email science@birdlife.org.

Polysticta stelleri (Steller's Eider)

Table 1. Reported national breeding population size and trends in Europe¹.

Country (or territory) ²	Population estimate				Short-term population trend ⁵				Long-term population trend ⁵				Subspecific population (where relevant)
	Size (pairs) ³	Europe (%)	Year(s)	Method ⁴	Direction ⁶	Magnitude (%) ⁷	Year(s)	Method ⁴	Direction ⁶	Magnitude (%) ⁷	Year(s)	Method ⁴	
Russia		<1	2008-2018		?				?				
Europe	0	100											

¹ See 'Sources' at end of factsheet, and for more details on individual EU Member State reports, see the Article 12 reporting portal at <http://bd.eionet.europa.eu/article12/report>.

² The designation of geographical entities and the presentation of the material do not imply the expression of any opinion whatsoever on the part of IUCN or BirdLife International concerning the legal status of any country, territory or area, or of its authorities, or concerning the delimitation of its frontiers or boundaries.

³ In the few cases where population size estimates were reported in units other than those specified, they were converted to the correct units using standard correction factors.

⁴ The 'method used' (replacing the data 'quality' assessment in the 2015 European Red List) is reported as: a) Complete: complete survey or a statistically robust estimate; b) Partial: based mainly on extrapolation from a limited amount of data; c) Expert: based mainly on expert opinion with very limited data; d) Defficient: insufficient or no data available.

⁵ The robustness of regional trends to the effects of any missing or incomplete data was tested using plausible scenarios, based on other sources of information, including any other reported information, recent national Red Lists, scientific literature, other publications and consultation with relevant experts.

⁶ Trend directions are reported as: increasing (+); decreasing (-); stable (0); fluctuating (F); or unknown (?).

⁷ Trend magnitudes are rounded to the nearest integer.

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Table 2. Reported national wintering population sizes and trends in Europe¹. Note that some countries within the species' wintering range did not report any data, and that only minimum totals are presented, to avoid double-counting of birds moving between countries.

Country (or territory) ²	Population estimate				Short-term population trend ⁵				Long-term population trend ⁵				Subspecific population (where relevant)
	Size (individuals) ³	Europe (%)	Year(s)	Method ⁴	Direction ⁶	Magnitude (%) ⁷	Year(s)	Method ⁴	Direction ⁶	Magnitude (%) ⁷	Year(s)	Method ⁴	
Estonia	800–1500	4	2013-2017	complete	-	-50 to -20	2006-2017	complete	0	-20 to 0	1980-2017	complete	
Finland	2–26	<1	2014-2018	complete	-	-42 to -60	2007-2018	complete	-	-25 to -99	1980-2018	complete	
Latvia	0–10	<1	2016-2016	partial	?		2007-2018	deficient	?		1980-2018	deficient	
Lithuania	0–1	<1	2013-2018	partial	-	-100 to 0	2013-2018	partial	-	-100 to -99	1980-2018	partial	
Norway	1000–2000	6	2013-2018	complete	-	-10 to -5	2013-2018	complete	-	-90 to -75	1980-2018	complete	
Russia	22000–24000	90	2009	complete	?		2010-2018	deficient	?		1980-2018	deficient	
Sweden	1–7	<1	2013-2018	partial	F		2007-2018	partial	F		1980-2018	partial	
EU28	800–1600	4											
Europe	23800–27600	100											

¹ See 'Sources' at end of factsheet, and for more details on individual EU Member State reports, see the Article 12 reporting portal at <http://bd.eionet.europa.eu/article12/report>.

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⁶ Trend directions are reported as: increasing (+); decreasing (-); stable (0); fluctuating (F); or unknown (?).

⁷ Trend magnitudes are rounded to the nearest integer.

Trend maps

A symbol appears in each country where the species occurs: the shape and colour of the symbol represent the population trend in that country, and the size of the symbol corresponds to the proportion of the European population occurring in that country.

KEY

- | | |
|---|----------------------------------|
| ↑ Large increase ($\geq 50\%$) | ↓ Large decrease ($\geq 50\%$) |
| ↑ Moderate increase (20–49%) | ↓ Moderate decrease (20–49%) |
| ↑ Small increase ($< 20\%$) | ↓ Small decrease ($< 20\%$) |
| ↑ Increase of unknown magnitude | ↓ Decrease of unknown magnitude |
| ■ Stable or fluctuating | |
| □ Unknown | |
| ○ Present (no population or trend data) | |
| × Extinct since 1980 | |

Each symbol, with the exception of Present and Extinct, may occur in up to three different size classes, corresponding to the proportion of the European population occurring in that country.

- ↑ Large: $\geq 10\%$ of the European population
- ↑ Medium: 1–9% of the European population
- ↑ Small: $< 1\%$ of the European population

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Figure 1. Breeding population sizes and short-term trends across Europe.

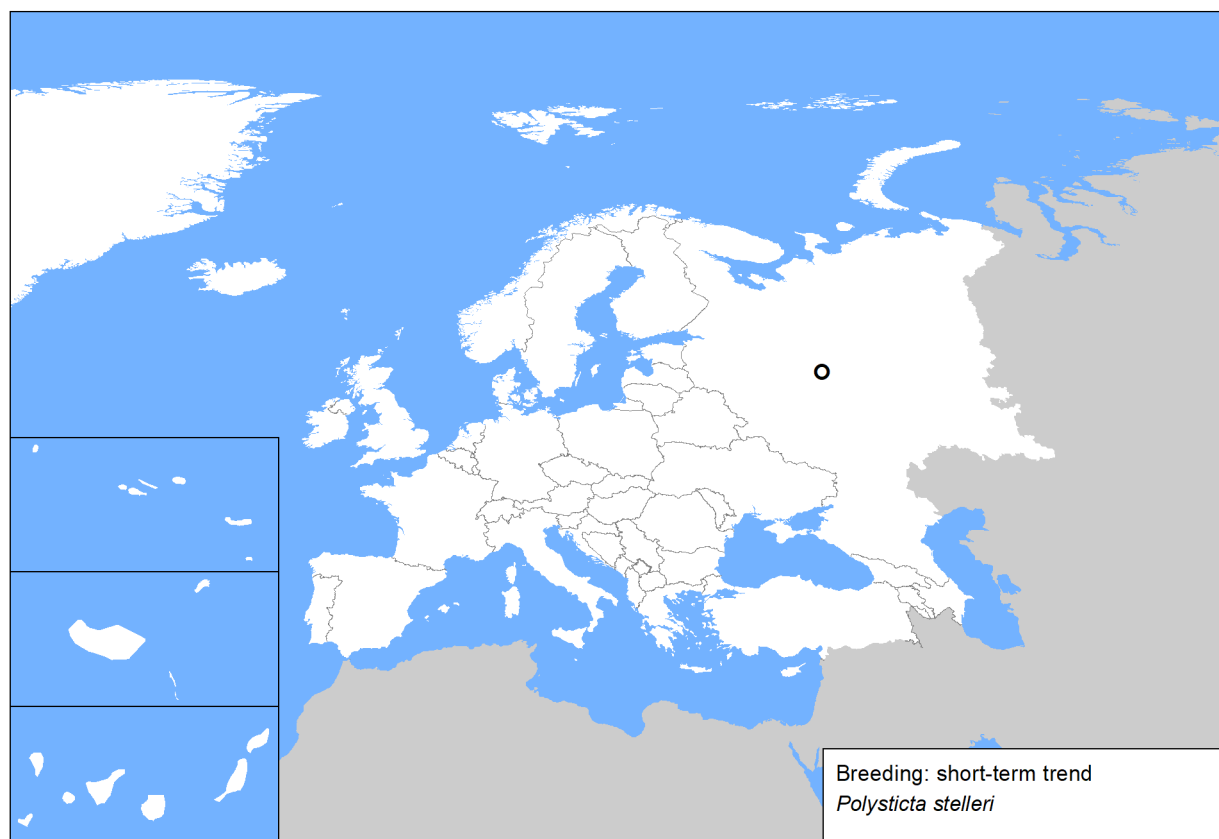


Figure 2. Breeding population sizes and long-term trends across Europe.

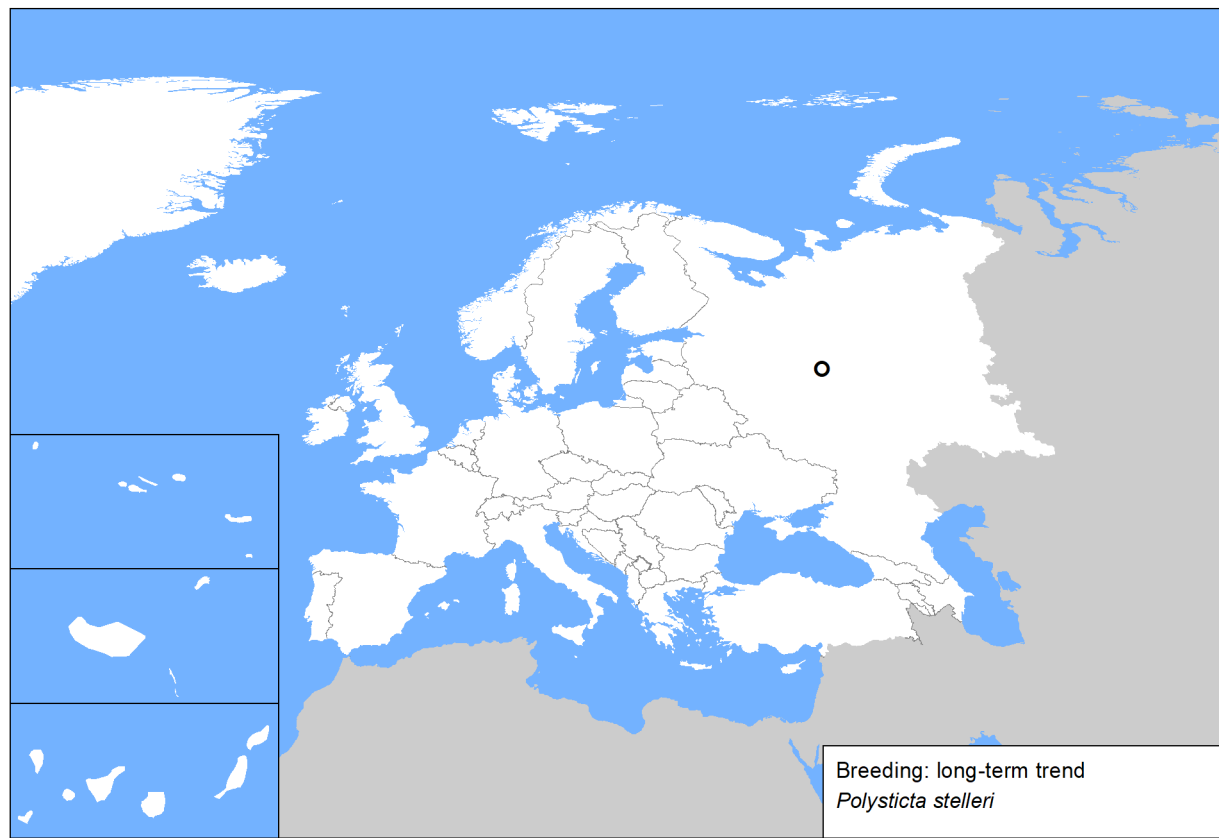


Figure 3. Reported wintering population sizes and short-term trends across Europe. Note that some countries within the species' wintering range did not report any data.

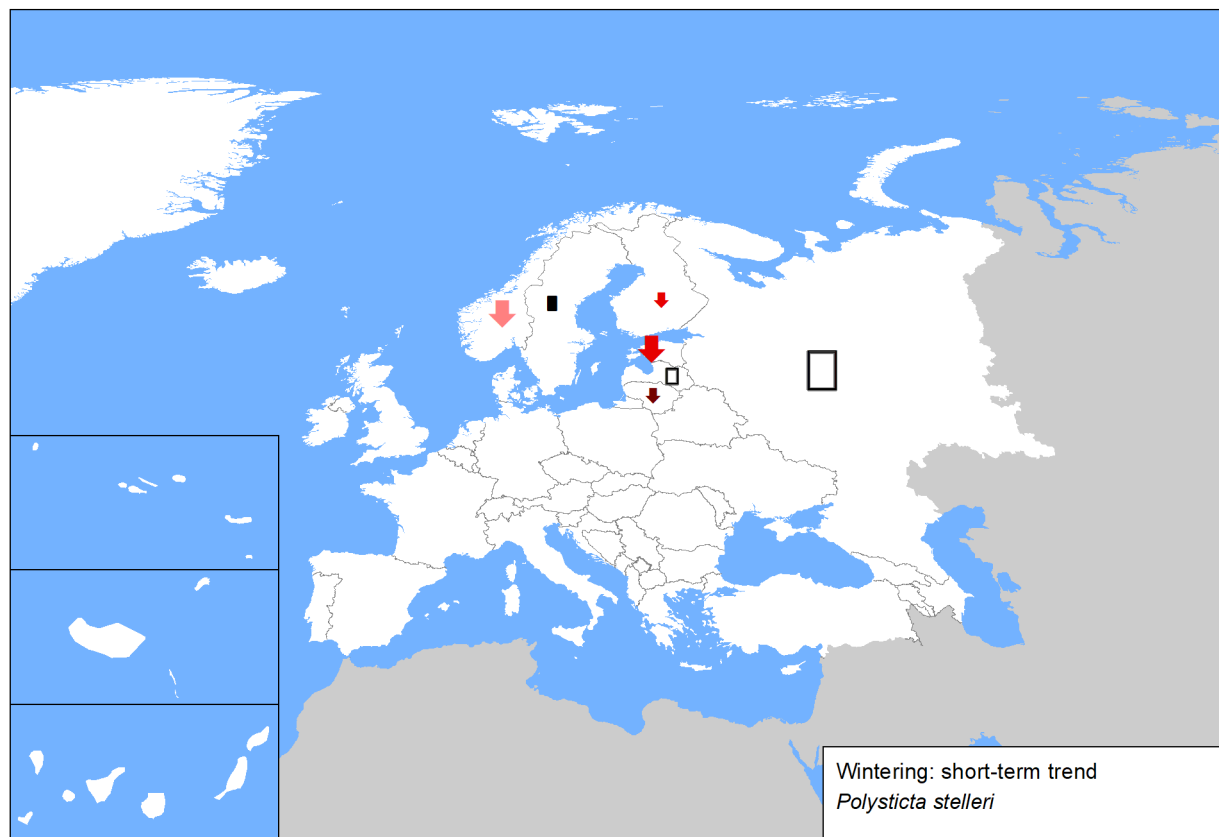
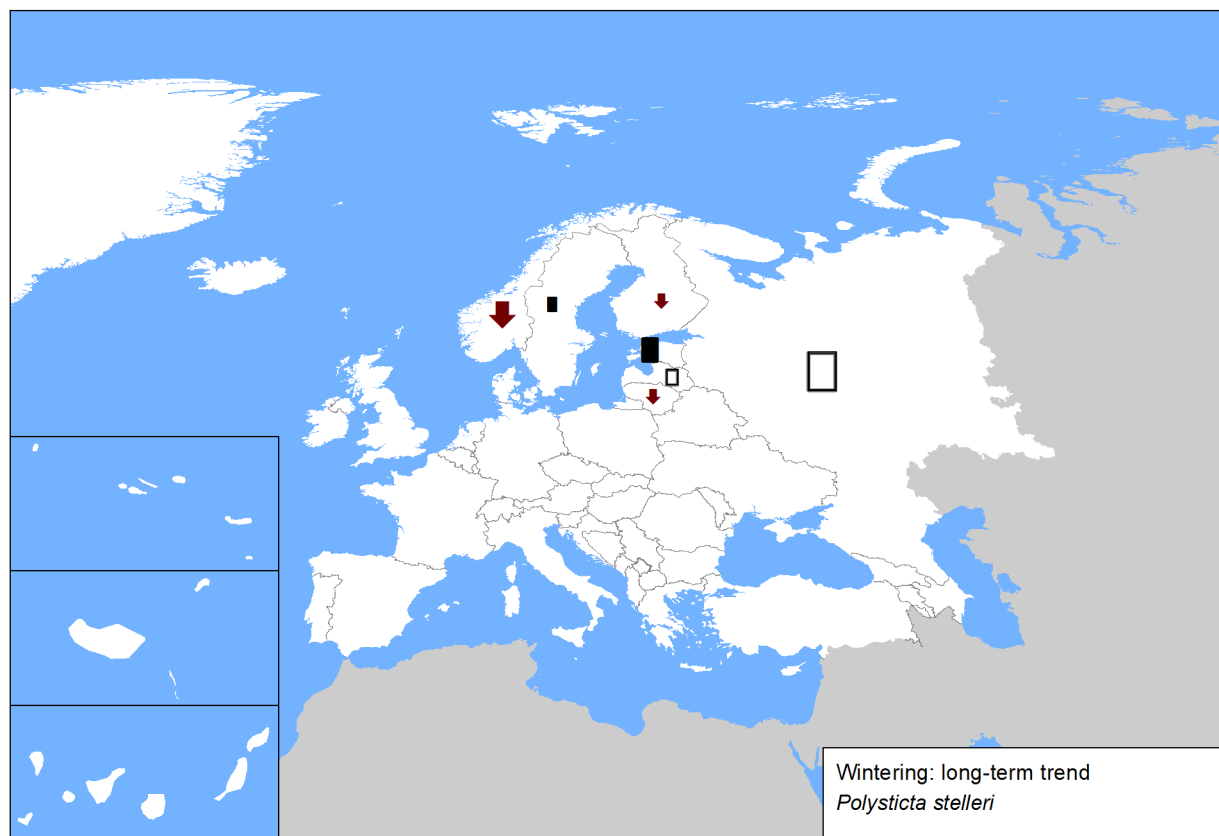


Figure 4. Reported wintering population sizes and long-term trends across Europe. Note that some countries within the species' wintering range did not report any data.



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Sources

Estonia

Winter population size: Estonian Working Group on Bird Status and Numbers
Winter short-term trend: Estonian Working Group on Bird Status and Numbers
Winter long-term trend: Estonian Working Group on Bird Status and Numbers

Finland

Winter population size: BirdLife Finland 2019: Tiira bird observation database.
Winter short-term trend: BirdLife Finland 2019: Tiira bird observation database.
Winter long-term trend: Winter bird censuses of the Finnish Museum of Natural History, University of Helsinki.

Latvia

Winter population size: Aunins A., Stipniece A. 2016. [Waterfowl counts at the seacoast. Final report for the year 2016.] (in Latvian). Latvian Ornithological society
Winter short-term trend: No data available.
Winter long-term trend: No data available.

Lithuania

Winter population size: Šniaukšta, L. 2015-2018 results of the midwinter waterfowl counts in Lithuania. Castren K. 2014. Birds of the Curonian Spit. Vilnius: Petro Ofsetas. Ministry of Environment of the Republic of Lithuania. 2012. Status and trends of bird populations (Article 12, Birds Directive 2009/147/EC) National Summary 2008-2012 Lithuania.
Winter short-term trend: Šniaukšta, L. 2015-2018 results of the midwinter waterfowl counts in Lithuania. Castren K. 2014. Birds of the Curonian Spit. Vilnius: Petro Ofsetas. Ministry of Environment of the Republic of Lithuania. 2012. Status and trends of bird populations (Article 12, Birds Directive 2009/147/EC) National Summary 2008-2012 Lithuania.
Winter long-term trend: Midwinter count data 2010-2012 State monitoring scheme data (2001-2012) LIFE05 NAT/LV/000100 project data Mindaugas Dagys (dagys@ekoi.lt) Šniaukšta, L. 2015-2018 results of the midwinter waterfowl counts in Lithuania. Logminas, V. (ed.). 1991. Lietuvos fauna: paukščiai. Vilnius: „Mokslas“. Švažas S., Meissner W., Serebryakov V., Kozulin A., Grishanov G. 2001. Changes of wintering sites of waterfowl in Central and Eastern Europe. Vilnius: OMPO Special Publication. OMPO Vilnius. 2002. Migratory Birds of the Western Palearctic. Vilnius: MOS. Švažas S., Vilksne J., Kuresoo A., Kozulin A. 2003. The Garganey and Shoveler in the Baltic States and Belarus. Vilnius: OMPO Special Publications. Raudonikis L. 2004. Important Bird Areas of the European Union Importance in Lithuania. Lithuanian Ornithological Society & Institute of Ecology of Vilnius University. Lutute, Vilnius. Vilksne J., Švažas S., Czajkowski A., Janaus M., Mischenko A., Kozulin A., Kuresoo A., Serebryakov V. 2010. Atlas of Duck Populations in Eastern Europe. Vilnius: „Akstis“. Nordic Council of Ministers. 2011. Waterbird Populations and Pressures in the Baltic Sea. Copenhagen: Rosendahl Bogtrykkeri AS. Jusys, V., Karalius, S., Raudonikis, L. 2012. Lietuvos paukščių pažinimo vadovas. Kaunas: „Lututė“. Ministry of Environment of the Republic of Lithuania. 2012. Status and trends of bird populations (Article 12, Birds Directive 2009/147/EC) National Summary 2008-2012 Lithuania. Castren K. 2014. Birds of the Curonian Spit. Vilnius: Petro Ofsetas.

Norway

Winter population size: (a) Heggøy, O., Øien, I.J. & Aarvak, T. 2019. Winter distribution of Steller's Eiders in the Varangerfjord, northern Norway. Ornis Norvegica 42: 1-6. (b) Aarvak, T., Øien, I.J. & Heggøy, O. 2019. Stellerand i Finnmark. Lappmeisen 30: 42-46.
Winter short-term trend: Artsobservasjoner www.artsobservasjoner.no
Winter long-term trend: (a) Heggøy, O., Øien, I.J. & Aarvak, T. 2019. Winter distribution of Steller's Eiders in the Varangerfjord, northern Norway. Ornis Norvegica 42: 1-6. (b) Aarvak, T., Øien, I.J. & Heggøy, O. 2019. Stellerand i Finnmark. Lappmeisen 30: 42-46.

Russia

Breeding population size: Pokrovskaya 2017
Winter population size: Aarvak et al. 2012

Sweden

Winter population size: Artportalen, Species Observation System www.artportalen.se
Winter short-term trend: Artportalen, Species Observation System www.artportalen.se
Winter long-term trend: Fågelåret, BirdLife Sweden yearly reports

Bibliography

Alaska SeaLife Center. 2004. Experts embark on challenging multi-year program to breed Steller's eiders in captivity for first time in Alaska.

Andresen, C.G.; Lougheed, V.L. 2015. Disappearing Arctic tundra ponds: Fine-scale analysis of surface hydrology in drained thaw lake basins over a 65-year period (1948-2013). *Journal of Geophysical Research Biogeosciences* 120.

Anon. 2001. Critical habitat designated for Spectacled and Steller's Eiders in Alaska. *WWF Arctic Bulletin*: 20-21.

Belobrov, R. V.; Artukhin, Y. B. 2008. Alarming information about wintering waterfowl on the Commander Islands. *Casarca* 11(2): 139-146.

Billerman, S.M., Keeney, B.K., Rodewald, P.G. and Schulenberg, T.S. (eds). 2020. *Birds of the World*. Cornell Laboratory of Ornithology, Ithaca.

Bird, J. P., Martin, R., Akçakaya, H. R., Gilroy, J., Burfield, I. J., Garnett, S. G., Symes, A., Taylor, J., Sekercioglu, Ç. H. and Butchart, S. H. M. 2020. Generation lengths of the world's birds and their implications for extinction risk. *Conservation Biology* 34(5): 1252-1261. DOI: 10.1111/cobi.13486.

BirdLife International. 2004. *Birds in Europe: population estimates, trends and conservation status*. BirdLife International, Cambridge, U.K.

Brazil, M. 2009. *Birds of East Asia: eastern China, Taiwan, Korea, Japan, eastern Russia*. Christopher Helm, London.

Collar, N. J. & Butchart, S. H. M. 2013. Conservation breeding and avian diversity: Chances and challenges. *International Zoo Yearbook* 48(1): 7-28.

Delany, S. and Scott, D. 2006. *Waterbird population estimates*. Wetlands International, Wageningen, The Netherlands.

Frederickson, L.H. 2001. Steller's Eider (*Polysticta stelleri*). In: A. Poole and F. Gill (eds), *The Birds of North America*, pp. 24. The Birds of North America, Inc, Philadelphia, PA, USA.

Gerasimov, Y. N.; Gerasimov, N. N. 2003. Estimation of Anatidae numbers on Kamchatka based on spring counts. In: Dorzhiev, T.Z. (ed.), *The modern problems of Siberia and Central Asia: Proceedings of the II International Ornithological Conference, Ulan-Ude, Russia, 16-19 May 2003*, pp. 36-37. Buryat State University Press, Ulan-Ude, Russia.

Hagemeijer, E.J.M. and Blair, M.J. 1997. *The EBCC atlas of European breeding birds: their distribution and abundance*. T. and A.D. Poyser, London.

Johnsgard, P.A. 1978. *Ducks, geese and swans of the World*. University of Nebraska Press, Lincoln and London.

Kear, J. 2005. *Ducks, geese and swans volume 2: species accounts (Cairina to Mergus)*. Oxford University Press, Oxford, U.K.

Krasnov, Y.V.; Ström, H.; Gavrilov, M.V.; Shavykin, A. A. 2004. Seabirds wintering in polynyas along Terskiy coast of the White Sea and along East Murman coast. *Ornitologia Neotropical* 31: 51-57.

Krasnov, Y.V.; Ström, H.; Gavrilov, M.V.; Shavykin, A. A. 2004. Seabirds wintering in polynyas along Terskiy coast of the White Sea and along East Murman coast. *Ornitologia Neotropical* 31: 51-57.

Larned, W. W. 2003. *Steller's Eider spring migration surveys southwest Alaska*.

- Larned, W. W. 2005. Steller's eider spring migration surveys, southwest Alaska, 2005.
- Larned, W. W. 2012. Steller's eider spring migration surveys, Southwest Alaska, 2011. United States Fish and Wildlife Service Report, Anchorage, Alaska.
- Larned, W.W. 2004. Steller's Eider spring migration surveys, Southwest Alaska 2004.
- Laubhan, M.K. and Metzner, K.A. 1999. Distribution and diurnal behavior of Steller's eiders wintering on the Alaska Peninsula. *Condor* 101(3): 694-698.
- Madge, S. and Burn, H. 1988. *Wildfowl*. Christopher Helm, London.
- Morse, S. 2009. A challenging future for the Steller's Eider. *Endangered Species Bulletin* 34(3): 22-23.
- Petersen, M. 1981. Populations, feeding ecology and molt of Steller's eiders. *Condor* 83: 256-262.
- Petersen, M. R. 1981. Populations, feeding ecology and molt of Steller's Eider. *Condor* 83: 256-262.
- Petersen, S. L.; Ryan, P. G.; Gremillet, D. 2006. Is food availability limiting African Penguins *Spheniscus demersus* at Boulders? A comparison of foraging effort at mainland and island colonies. *Ibis* 148: 14-26.
- Safine, D. E. 2011. Breeding ecology of Steller's and spectacled eiders nesting near Barrow, Alaska, 2008-2010. United States Fish and Wildlife Service Technical Report, Fairbanks, Alaska.
- Scott, D.A. and Rose, P.M. 1996. Atlas of Anatidae populations in Africa and western Eurasia. Wetlands International, Wageningen, Netherlands.
- Zydelis, R.; Lorentsen, S-H.; Fox, A.D.; Kuresoo, A.; Krasnov, Y.; Goryaev, Y.; Bustnes, J.O.; Hario, M.; Nilsson, L.; Stipniece, A. 2006. Recent changes in the status of Steller's Eider *Polysticta stelleri* wintering in Europe: a decline or redistribution? *Bird Conservation International* 16(3): 217-236.
- Zydelis, R.; Lorentsen, S-H.; Fox, A.D.; Kuresoo, A.; Krasnov, Y.; Goryaev, Y.; Bustnes, J.O.; Hario, M.; Nilsson, L.; Stipniece, A. 2006. Recent changes in the status of Steller's Eider *Polysticta stelleri* wintering in Europe: a decline or redistribution? *Bird Conservation International* 16(3): 217-236.
- del Hoyo, J., Elliot, A. & Sargatal, J. (ed.). 1992. Handbook of the Birds of the World, Vol. 1: Ostrich to Ducks. Lynx Edicions, Barcelona, Spain.