

Northern Ireland Species Action Plan
Roseate Tern
Sterna dougallii
March 2005

1. Current Status and Condition

- 1.1** The roseate tern *Sterna dougallii* is a ground nesting migratory colonial seabird. It occurs in Northern Ireland in the months May to August wintering off the coast of western Africa.
- 1.2** The roseate tern has a highly fragmented breeding range in the north-East Atlantic. Its European stronghold is the Azores (Portugal) which supports 1000 - 1500 pairs out of a north-east Atlantic population of between 1,900 and 2,400 pairs (Mitchell *et al.*, 2004).
- 1.3** Elsewhere the species breeds only very locally in Britain, Ireland and France. Seabird 2000 (Mitchell *et al.*, 2004) estimated the total British and Irish breeding population at 790 pairs, 738 nests being found in Ireland. The majority were at Rockabill, Co. Dublin (the main colony in the British Isles since 1986) with 618 nests. In 2004, 677 nests were found at Rockabill (Mitchell *et al.*, 2004).
- 1.4** In Northern Ireland four nests were found during Seabird 2000, all in Larne Lough, Co Antrim (Mitchell *et al.*, 2004). This is the only extant site for the species in Northern Ireland. It is one of Britain and Ireland's rarest breeding seabirds, with only Mediterranean gull *Larus melanocephalus* being rarer. Although both the Northern Ireland and UK populations have declined greatly, many of the birds have moved to the growing colony at Rockabill. Numbers at other colonies such as Larne Lough, continue to fluctuate, with eight nests present in 2004. However, the overall trend for the species in north-west Europe is upward.
- 1.5** Productivity at Rockabill is very good averaging 1.5 chicks per pair and has been a major factor in the recent increase in the north-west European population as a whole (Ratcliffe *et al.*, 1998; Mitchell *et al.*, 2004). Productivity at Larne Lough is poor, averaging less than 0.5 chicks per pair compared to 1.2 in the rest of the UK. It is considered that productivity of greater than 1.0 chick per year is necessary for a self sustaining population of the species.
- 1.6** The key wintering area for breeding roseate terns in the UK is West Africa and in particular Ghana (Mitchell *et al.*, 2004).
- 1.7** The roseate tern is specially protected under Schedule 1 of the *Wildlife (Northern Ireland) Order 1985*, and is listed on Annex I of the EC Birds Directive and Appendix II of the Bern Convention.

2. Current Factors Affecting the Population

- 2.1 Re-distribution - the decrease in UK breeding numbers is partly due to a change in distribution, since the colony at Rockabill, in the Irish Republic, has shown a corresponding increase in numbers (Mitchell *et al.*, 2004).
- 2.2 Nesting space and competition - this has been reflected in Northern Ireland with the loss of colonies in Strangford and Carlingford Loughs during the 1980s and early 1990s. Competition may occur between early nesting roseate and late nesting common terns. This becomes more important at sites with few crevices or long vegetation such as Green Island in Carlingford Lough, Co Down. At some sites there was apparent competition between terns and gulls, especially black-headed gull, for nesting areas such as on Swan Island, Larne Lough.
- 2.3 Food supply - long-term changes in sea-surface temperature may be partly responsible for the consistent and continued decline of fish stocks, e.g. *Sardinella* spp., in coastal West Africa and the Gulf of Guinea. As the winter progresses, *Sardinella* become less available to terns in this region and the whereabouts of roseate terns and the composition of their diet in the December to May period remain unknown.
- 2.4 Trapping - of terns for sport or food in West Africa is undoubtedly a major cause of mortality (Everett *et al.*, 1987; N. Ratcliffe pers. comm.).
- 2.5 Predation - particularly by foxes and rats, may restrict nesting to offshore islands. Even on the more remote sites, such as Green Island, Carlingford Lough, predation by larger species of gulls may threaten breeding attempts (D.Allen, pers. obs.)
- 2.6 Development - as roseate terns are currently restricted to one site in Northern Ireland, the colony is extremely vulnerable to adverse impact from inappropriate development within Larne Lough.

3. Current Action

- 3.1 *Council Directive (79/409/EEC) on the conservation of wild birds*, the Birds Directive, was adopted in 1979 and requires member states to identify areas to be given special protection for rare or vulnerable species, and for regularly occurring migratory species. Two sites have been classified as Special Protected Areas (SPAs) under Article 4.2 of the Directive for its roseate tern interest – Larne Lough SPA and Swan Island SPA, which is also within Larne Lough SPA. Although Swan Island is currently not used by roseate terns, the Blue Circle Island, again within Larne Lough SPA, holds the only extant colony in Northern Ireland.
- 3.2 The *Conservation (Nature Habitats, etc.) Regulations (Northern Ireland) 1995* and *The Conservation (Natural Habitats, etc.) (Amendment) Regulations (Northern Ireland) 2004* (The Habitat Regulations) require competent authorities, when considering a plan or project not directly connected with the management of a European site e.g. an SAC or SPA, to undertake an Article 6 assessment. This assessment will determine if the plan or project, either alone or in combination with other plans or projects, is likely to have a significant impact on the site. In the case of

a negative or undetermined assessment, a competent authority may only agree to the plan or project where it is satisfied that there are no alternative solutions and that the plan or project must be carried out for imperative reasons of overriding public interest, which may be of a social or economic nature. However, if the site hosts a priority habitat or species then the plan or project may only be approved for: a) reasons of human health, public safety, beneficial consequences of primary importance to the environment, or b) other reasons which the Department (DOE), having considered the opinion of the European Commission (EC), determines are imperative reasons of overriding public interest.

- 3.3** Under the terms of the Habitat Regulations, the above Article 6 assessment by the competent authority is required for plans or projects e.g. land reclamation, which are outside European sites but may still have an impact on the site.
- 3.4** Guidance to help competent authorities and others to interpret the Habitat Regulations has been published (EHS, 2002).
- 3.5** Guidance on the completion of an Article 6 assessment has also been published (European Commission, 2000)
- 3.6** Under the *Nature Conservation and Amenity Lands (Northern Ireland) Order 1985*, Areas of Special Scientific Interest (ASSIs) are identified and declared by the Department of the Environment (DOE) through the Environment and Heritage Service (EHS). *The Environment (Northern Ireland) Order 2002*, strengthened the protection of ASSIs, recognising the importance of working in partnership with owners and occupiers and facilitating the positive management of these sites. All SPAs are designated as ASSIs before being classified as SPAs.
- 3.7** Management for the benefit of roseate terns has been implemented at all regularly used sites and destruction of “large gull” eggs has taken place at several such ‘previously used’ roseate tern islands where a direct threat was apparent. The removal of black-headed gull *Larus ridibundus* has taken place, under licence, on Swan Island, Larne Lough to create more space on the small island. The movement of birds to the larger Blue Circle Island has meant that this practice has been discontinued.
- 3.8** Similarly other sites are being managed to produce suitable sward and ground conditions. Attraction of common terns *Sterna hirundo* in the first instance can lead to roseate terns colonising at a later date. The provision of well protected artificial sites may be critical in allowing the species to spread to new sites. Both, Mew Island, Copeland Islands and Belfast Lough RSPB Reserve, Co Down are being managed to attract terns (Mitchell *et al.*, 2004). Remedial management on tern sites should only be undertaken where it is known that terns can nest in safety from tides, predators and disturbance. These parameters are only likely to be met on off-shore or artificially protected islands.
- 3.9** Whenever possible all roseate tern pulli are ringed by RSPB with both a BTO ring and a roseate special ring, on which the number is readable in the field. This enables some tracing of individual birds to be undertaken.
- 3.10** All known roseate tern sites are monitored by nest counts annually.

- 3.11** RSPB and BirdLife International have previously funded an education programme, run by the Government of Ghana, to try to reduce the incidence of winter trapping (Everett *et al.*, 1987; Mitchell *et al.*, 2004). The initial impacts have now been lost and the programme needs resurrecting (Mitchell *et al.*, 2004; N. Ratcliffe pers. comm.).

4 Action Plan Targets

- 4.1** Maintain one colony of roseate tern.
- 4.2** Increase the Northern Ireland breeding population to 20 pairs by 2010.
- 4.3** Increase the Northern Ireland breeding population to 30 pairs (at two or more colonies), by 2015
- 4.4** Enable roseate tern productivity at all colonies to average above 1.2 fledged young per pair for each of three successive years within each five year period (2005 – 2010 - 2015).

5. Proposed Actions with Lead Agencies

5.1 Policy and legislation

- 5.1.1** Ensure that important roseate tern sites, both current and former important breeding sites for roseate tern and their conservation management requirements are recognised and site protection policies are included in statutory and non-statutory plans e.g. Development Plans, Local Biodiversity Action Plans (LBAP's) and appropriate management strategies.
(ACTION: Planning Service, EHS, DARD, District Councils)

5.2 Site safeguard and management

- 5.2.1** By 2006, produce conservation objectives for all statutory sites which include roseate tern as a selection feature.
(ACTION: EHS)
- 5.2.2** Continue and, where appropriate, enhance species management measures at current and potential roseate tern sites appropriately, including – Larne Lough (Blue Circle and Swan Islands), Carlingford Lough (Green Island), Strangford Lough (select the islands least vulnerable to disturbance and predation), Belfast Harbour Lagoon and Copeland Islands.
(ACTION: EHS)
- 5.2.3** By 2008 develop, where practicable, additional suitably protected and positioned artificial nesting islands.
(ACTION: EHS)

5.3 Species management and protection

- 5.3.1 By 2008, ensure that levels of predation and inter-specific competition at breeding sites are properly monitored and, if proved to be necessary, authorise a programme of predator control and/or removal of competitors.
(ACTION: EHS)

5.4 Advisory

- 5.4.1 By 2006, ensure all relevant information on best practice is made available to those agencies or organisations involved in management for roseate tern.
(ACTION: EHS).
- 5.4.2 By 2006, ensure that information on roseate tern in Northern Ireland is available to all those who could play a role in their conservation and recovery.
(ACTION: EHS)

5.5 International

- 5.5.1 Further develop links with the Republic of Ireland and other European and international organisations and programmes such as the European Environment Agency and the European Centre for Nature Conservation, to promote the exchange of information and experience in research, management techniques, education and conservation strategies.
(ACTION: EHS)
- 5.5.2 Support International roseate tern programmes in countries where there are strong links to Northern Irish birds, especially Republic of Ireland and Ghana.
(ACTION: EHS)
- 5.5.3 Ensure continued cross-border cooperation on research, monitoring and management of the All-Ireland roseate tern population.
(ACTION: EHS)

5.6 Future Research and Monitoring

- 5.6.1 By 2007, undertake appropriate research to determine the major factors limiting roseate tern numbers in Northern Ireland.
(ACTION: EHS)
- 5.6.2 Continue to support the on-going roseate tern ringing scheme in Northern Ireland.
(ACTION: EHS)
- 5.6.3 By 2006, ensure all current and potential sites are monitored for roseate tern activity annually.
(ACTION: EHS)

5.7 Communications and publicity

- 5.7.1 Publicise all positive roseate tern stories.
(ACTION: EHS)
- 5.7.2 By 2006, produce and distribute relevant literature and leaflets on roseate terns e.g. the roseate tern newsletter produced by the roseate tern working group.
(ACTION: EHS)

5.8 Links with other plans

- 5.8.1 This plan should be considered in conjunction with the following Northern Ireland and UK Habitat Action Plans:-
- Saline lagoons (Northern Ireland and UK)
 - Coastal vegetated shingle (Northern Ireland and UK)
- 5.8.2 This plan should be considered in conjunction with the following Northern Ireland and UK Species Action Plans:-
- Roseate Tern

6 Costings

- 6.1 A table showing the global costs for this and other HAPs is available on the EHS/Biodiversity web page.

7. Key references

Environment and Heritage Service (2002) Habitats Regulations. A guide for competent authorities. EHS

European Commission (2000). Managing Natura 2000 sites: The provisions of Article 6 of the 'Habitats' Directive 92/43/EEC. Luxemburg

Everett, M.J., Hepburn, I.R., Ntiamao-Baidu, Y. & Thomas, G.J. (1987). Roseate Terns in Britain and West Africa. *RSPB Conserv. Rev.* 1: 56-58.

Mitchell, P. I., Newton, S. F., Ratcliffe, N., & Dunn, T. E. (2004). *Seabird Populations of Britain and Ireland*. T & AD Poyser, London.

Ratcliffe, N., Newton, S. F. & Green, R. E. (1998). Survival rates, inter-colony movements and viability of north west European Roseate Tern Population. *Proc. Colonial Waterbirds Conference, Florida, 1998*.

List of Useful Acronyms

ASSI	Area of Special Scientific Interest
BAP	Biodiversity Action Plan
CEDaR	Centre for Environmental Data and Recording
CMD	Countryside Management Division
CMS	Countryside Management Scheme
DARD	Department of Agricultural and Rural Development
DCAL	Department of Culture, Arts and Leisure
DETI	Department of Enterprise, Trade and Industry
DOE	Department of the Environment
DRD	Department for Regional Development
EHS	Environment and Heritage Service
ESA	Environmentally Sensitive Area
ESCRs	Earth Science Conservation Review Site
HAP	Habitat Action Plan
JNCC	Joint Nature Conservation Committee
MAGNI	The National Museums and Galleries of Northern Ireland
NIBG	Northern Ireland Biodiversity Group
NICS	Northern Ireland Countryside Survey
NNR	National Nature Reserve
PPG	Planning Policy Guideline
PPS	Planning Policy Statement
RA	Rivers Agency
RSPB	Royal Society for the Protection of Birds
SAC	Special Area of Conservation
SAP	Species Action Plan
SLNCI	Sites of Local Nature Conservation Importance
SoCC	Species of Conservation Concern
SPA	Special Protection Area
WFD	Water Framework Directive
WWT	Wildfowl and Wetlands Trust