

Northern Ireland Species Action Plan
Meadow cranesbill
Geranium pratense
March 2005

1. Current Status

- 1.1** Meadow cranesbill *Geranium pratense* L. is a downy perennial herb, with a bright blue flower with delicate violet veins towards the centre. *G. pratense* stems can grow up to 80cm and flowers from June to September. After flowering, the seedpods resemble 'crane's bills', and the seeds are then dispersed in an explosive manner.
- 1.2** *G. pratense* occurs in a variety of habitats and flourishes in light open deciduous woodland, hedgerows, river banks, roadsides, scrub and in damp meadows as well as hill pastures. It is generally a plant of lowland habitat but it can be found growing up to an altitude of 550m (Horwood, 1919), exceptionally at 845m on Great Dun Fell, Westmoorland (Preston *et al.*, 2002).
- 1.3** *G. pratense* is widespread throughout Europe from Scandinavia southwards but it is rare in the Mediterranean. It is also native to Asia where it can be found in the north to central regions, the Ussuri region of Japan and to the west of the Himalayas (Clapham, *et al.*, 1987). *G. pratense* is abundant in much of Britain but absent from northern Scotland, parts of Wales, and southern England. However it has been introduced to Devon and Cornwall. It is very localised in Northern Ireland and is restricted to the North Coast between Ballycastle and Dunluce Castle, on sand dunes and in grassy places near the sea. *G. pratense* has only been recorded as a garden escape elsewhere in Ireland (Stace, 1995).
- 1.4** *G. pratense* was first recorded in Northern Ireland in 1821 at Portballintrae however this population no longer exists. The Centre for Environmental Data and Recording (CEDaR) currently holds eighty-six records for the species in Northern Ireland, which occupy twenty-five 10x10km squares (Preston *et al.*, 2002). Fifty-one of these records are however believed to be garden escapes. Native populations have been identified in two 10x10km squares on the north Antrim coast, between Portrush and Ballycastle. Between 1970 and 1986 the species was completely lost from sites such as Portballintrae and the Giant's Causeway. The species has retained its stronghold at Dunluce Castle, Portbradden, Ballintoy and White Park Bay.

2. Current Factors Causing Loss or Decline

- 2.1** Agricultural improvement – *G. pratense* continues to decline in the UK and Ireland where it was formerly frequent in hay meadows, due to changes in agricultural practices. Traditional management of meadows produced species rich grassland but this has now been largely lost.
- 2.2** Road verge management – *G. pratense* is now largely restricted to roadside verges which are infrequently cut and have become the refuge of many meadow plants. Any extensive grass cutting before the seeds have been able to disperse will have an impact on local populations.

- 2.3 Habitat fragmentation – leads to small isolated colonies vulnerable to extinction through chance events, natural population fluctuations and genetic decline.

3. Current Action

- 3.1 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. White Park Bay ASSI contains one of the few populations of *G. pratense*.
- 3.2 Survey and monitoring work is carried out by EHS at White Park Bay ASSI.
- 3.3 In 2000, the Northern Ireland Biodiversity Group (NIBG) produced its recommendations to Government (NIBG, 2000). These were largely accepted by the Northern Ireland Executive in 2002, with the publication of the *Northern Ireland Biodiversity Strategy* (DOE, 2002). As part of this process, a revised list of Northern Ireland priority species was published in March 2004. This list includes *G. pratense*.
- 3.4 Regional Planning and Transportation Division within DRD is responsible for co-ordinating the implementation of the *Regional Development Strategy (RDS) for Northern Ireland 2025* (DRD, 2001). The RDS contains a Spatial Development Strategy and related Strategic Planning Guidelines (SPGs). The emphasis in the SPGs is on competitiveness, sustainable development and tackling social exclusion and division. Operational policies to give effect to the SPGs are contained in Planning Policy Statements (PPSs). Some of these policies have a direct or indirect bearing on the prevention of adverse impacts on priority habitats and species.
- 3.5 *PPS2 Planning and Nature Conservation* (DOE, 1997) (under review) contains planning policy for the hierarchy of sites of nature conservation importance. It also addresses trees and woodlands, protection of species and peatlands.
- 3.6 *PPS14 Sustainable Development in the Countryside* is due to be published by the end of 2005.
- 3.7 Site protection policies are included in Development Plans. These include the identification of Sites of Local Nature Conservation Importance (SLNCIs). Planning Service is currently considering which SLNCIs will be formally identified in Development Plans. Where such sites are confirmed in adopted plans, specific planning policies will be applied to development proposals on those sites.
- 3.8 DARD, through its Countryside Management Branch (CMB), has developed a series of agri-environment schemes including the Environmentally Sensitive Areas (ESA) Scheme (revised in 2000) and the Countryside Management Scheme (CMS). A further revision to both the ESA and CMS has recently been approved under the current Northern Ireland Rural Development Programme (2000-2006). Their objective is to

protect and enhance semi-natural habitats and species by encouraging more sensitive management practices. Both these schemes have similar management provisions, are voluntary and apply to the whole farm. These schemes provide a mechanism for delivering some of the targets listed in action plans for many species and habitats, targeting areas of as little as 0.1 ha of semi-natural habitat in order to maintain or improve their present conservation value. Around 230,000 ha of farmland is currently in agri-environment schemes in Northern Ireland, approaching a quarter of the total agricultural land in the Province.

- 3.9** The designation of ESAs commenced in 1988 and today there are five ESAs in Northern Ireland. DARD has determined a number of priority habitats which, if they occur on the farm, must be brought under agreement and managed according to relevant prescriptions determined by DARD.
- 3.10** The Habitat Improvement Scheme (HIS) aims to help farmers protect, enhance and establish habitats which are considered to have major conservation value. This is achieved by taking land out of agricultural production or by entering into a 10 year agreement which involves extensive grazing based on non-application of fertilizers and pesticides to the land. No new applications for the HIS are being accepted as the scheme closed in mid-1999. The scheme has been replaced by the Countryside Management Scheme (CMS).
- 3.11** The CMS, launched in 1999, was developed with the primary aim to maintain and enhance biodiversity and is open to all farmers and landowners outside ESAs. Where funding is limited, entry into the scheme is competitive, being based on who can offer the greatest environmental benefits.
- 3.12** The Management of Sensitive Sites scheme (MOSS) was launched in 2002 by EHS. It is a voluntary scheme designed to ensure the positive management of ASSI features, for example coastal sand dunes and lowland meadow and pasture. Under the scheme, landowners can receive payment for carrying out conservation work within the framework of a written agreement. MOSS covers issues such as agricultural improvement, grazing and control of invasive scrub species. One-off payments for works such as fencing and scrub clearance to assist grazing can be made.
- 3.13** Roads Service has produced an Environmental booklet (DOE, 1998) (under review) as a guidance to road contractors to minimise the impacts of roads from the design stage through to construction including the protection of species and habitats inside and outside designated areas.
- 3.14** Other relevant information is gathered through specialist biological recording groups, Non-Governmental Organisations (NGOs), universities and other government bodies. Biological records are currently stored in the Museum and Galleries of Northern Ireland (MAGNI) at the Centre for Environmental Data and Recording (CEDaR). CEDaR was established in 1995 in partnership with EHS, MAGNI and the biological recording community. There are currently over 1.4 million records held by CEDaR and there are plans underway to make these records more accessible through the Internet. This will be achieved through the National Biodiversity Network, a union of organisations throughout the UK working together to create an information network of accessible biological data for biodiversity information.

4. Action Plan Targets

- 4.1 Maintain the current population of *G. pratense* at 4 sites.
- 4.2 Maintain the current range of *G. pratense* at 2 10x10 km squares.
- 4.3 By 2015, increase the number of *G. pratense* populations to 5 sites.
- 4.4 By 2015, increase the range of *G. pratense* to 3 10x10 km squares

5. Proposed Actions with Lead Agencies

5.1 Policy and legislation

- 5.1.1 By 2007, review the coverage *G. pratense* sites within cSAC, ASSI and NNR series and, if necessary, notify further sites to fill significant gaps.
(ACTION: EHS)
- 5.1.2 By 2006, review and if necessary, increase the level of protection given to *G. pratense* in the *Wildlife (Northern Ireland) Order 1985*.
(ACTION: EHS)
- 5.1.3 By 2008, ensure that important *G. pratense* sites are recognised and, where appropriate, site protection policies are included in statutory and non-statutory plans e.g. Development Plans and other strategic plans, including Local Biodiversity Action Plans (LBAPs).
(ACTION: Planning Service, EHS, DARD, District Councils)
- 5.1.4 By 2007, ensure that agri-environment scheme prescriptions relevant/appropriate to *G. pratense* are contributing to maintaining and enhancing the population across Northern Ireland.
(ACTION: DARD, EHS)
- 5.1.5 By 2008, target positive management through MOSS, agri-environment schemes, the LBAP process and grant aid for biodiversity to secure favourable management on *G. pratense* sites.
(ACTION: EHS, DARD)

5.2 Site safeguard and management

- 5.2.1 By 2006, produce conservation objectives for all statutory sites containing *G. pratense*.
(ACTION: EHS)
- 5.2.2 By 2009, secure favourable management of selected historical sites for *G. pratense* to encourage the recovery of these 'extinct' populations.
(ACTION: EHS)

5.3 Species management and protection

- 5.3.1 By 2009, ensure that all known sites are managed in a manner that is beneficial to the conservation of *G. pratense*.
(ACTION: EHS)

5.4 Advisory

- 5.4.1 By 2006, provide advice to land owners with *G. pratense* on their land about suitable management requirements of the species.
(ACTION: EHS, DARD)
- 5.4.2 By 2006, ensure that information on *G. pratense* in Northern Ireland is available to all those who could play a role in its conservation and recovery including competent authorities and environmental consultants involved in the preparation of Environmental Impact Assessments.
(ACTION: EHS, DARD)

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)

5.6 Future research and monitoring

- 5.6.1 By 2005, establish the distribution, abundance and viability of *G. pratense*.
(ACTION: EHS)
- 5.6.2 Periodically review monitoring protocols and condition assessment methodology for statutory sites with *G. pratense*.
(ACTION: EHS)
- 5.6.3 By 2010, research the ecology of *G. pratense* to further understand its presence and ecological requirements in Northern Ireland.
(ACTION: EHS)
- 5.6.4 Monitor habitat condition and management to ensure that optimal site management is achieved.
(ACTION: EHS)
- 5.6.5 By 2006, set in place a reporting and monitoring structure to encourage progress towards the delivery of the targets and the completion of actions identified in this plan.
(ACTION: EHS)

5.7 Communications and publicity

- 5.7.1 Raise awareness of the species among the general public, volunteers, botanists and professional conservation workers and researchers e.g. by means of reports, publications, field meetings and presentation of research results at conferences.
(ACTION: EHS)

6. Links with other Action Plans

- 6.1 This plan should be considered in conjunction with the following UK and Northern Ireland Habitat Action Plans:
- Coastal sand dunes
 - Lowland meadows
 - Maritime cliff and slope

7. Costings

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

8. References

Clapham A. R., Tutin T. G. and Warburg E. F., (1987). *Flora of the British Isles*, 3rd edn. Cambridge University Press

Department of the Environment, 1998. *Roads Service Environmental Handbook*. Roads Service, Belfast.

Department of the Environment for Northern Ireland. (1997). *Planning Policy Statement 2: Planning and Nature Conservation*. Department of the Environment for Northern Ireland (Planning Service), Belfast.

Department of the Environment (2002). *Northern Ireland Biodiversity Strategy*. Environment and Heritage Service, Belfast.

Department of Regional Development (2001). *The Regional Development Strategy 2025*. DRD, Belfast.

Horwood AR, 1919, *British Wild Flowers in their Natural Haunts* Anew British Flora, Volume 2. Gresham, London, UK

Northern Ireland Biodiversity Group (2000). *Biodiversity in Northern Ireland: Recommendations to Government for a Biodiversity Strategy*. HMSO, Belfast.

Preston, C.D., Pearman, D.A. & Dines, T.D. (2002) *New Atlas of the British & Irish Flora*. Oxford University Press, Oxford.

Stace, C.A., (1995) *New Flora of the British Isles*. Cambridge.

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
NESA	New Environmentally Sensitive Area
NIBG	Northern Ireland Biodiversity Group
NICS	Northern Ireland Countryside Survey
NNR	National Nature Reserve
PPS	Planning Policy Statement
RA	Rivers Agency
RSPB	Royal Society for the Protection of Birds
SAC	Special Area of Conservation
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
UWT	Ulster Wildlife Trust