

Guidance on Monitoring Access and Recreation at Sensitive Natural Heritage Sites

Natural Heritage Management



Advice on how to monitor access and recreation at sensitive natural heritage sites is now available online. The advice comprises:

- Information on why, and what, to monitor
- An introduction to some core monitoring techniques
- A step-by-step process to guide the planning and implementation of monitoring - including templates to help draft a Monitoring Strategy
- Appendices containing: pro formas to customise for your site, information from case studies, full literature review

Introduction to the Advice

Access and recreation can have both positive and negative impacts on areas and aspects of the countryside. In considering a range of natural heritage sensitivities, Scottish Natural Heritage (SNH), with input from representatives of The National Trust for Scotland, **sportscotland**, the Royal Society for the Protection of Birds (RSPB), and Loch Lomond and The Trossachs National Park Authority, has produced advice which aims to help site managers better understand the type, scale and patterns of recreational use, and what changes in natural heritage features may be attributable to such use.

The advice presents a methodology which aims to help site managers plan and implement the survey / monitoring of access and recreation, and possible impacts on the natural heritage, with a view to providing clearer evidence that can be used to guide future management decisions. It is likely to be most useful to the managers of sites that are protected as a result of their ecological value, where sensitivity to damage or disturbance is widely recognised, and visitor activity may give cause for concern. It focuses on access to, and recreation on, inland water bodies in Scotland, but can be applied at a wide range of sites where management of natural heritage values is a primary objective.

The advice is likely to be most useful for site managers, but also tries to reflect the fact that many different organisations could play a role in monitoring recreation and natural heritage responses. Where possible, they should aim to do this in a co-ordinated way to make best use of time, skills and resources available. Good monitoring information is the key to fair and effective management of sensitive natural heritage sites.

Advice based on research

The advice is based on research which was undertaken for SNH by Land Use Consultants and comprised: **a comprehensive review of recent published and unpublished literature**; consideration of a series of **Case Studies** which illustrated the range of approaches to survey / monitoring that have been used by researchers and site managers including:

- long term research on the influence of hunting on bird disturbance at two Danish wetlands;
- an ecological study that focused on impacts on nesting black-throated divers at remote lochs in the Scottish Highlands;
- monitoring of impacts of recreation on upland species and habitats on Cairn Gorm;
- monitoring of boating on Loch Lomond;
- research exploring impacts of recreation at several water bodies within the Lee Valley Regional Park, Hertfordshire; and
- the approach used on the island of Mousa, Shetland, to identify impacts on harbour seals and arctic tern.

On the basis of this research, the advice was drafted and **feedback on it was sought from site managers at Loch Leven in Perth and Kinross, and five other Pilot Sites:** Loch Maree and Glencoe in the Highlands; Loch Ken in Dumfriesshire; Aberlady Bay in East Lothian; and Loch of Skene in Aberdeenshire. This helped to improve understanding of how different site contexts influence the formulation of appropriate monitoring approaches.

In preparing the advice it was recognised that a balance was needed between providing practical advice, and offering a process that attempted to generate evidence upon which definitive conclusions about cause and effect can be based. The result is advice at a practical level which aims to improve recreation and access monitoring approaches so that they can be better linked with environmental information and can perhaps aid comparison between similar sites. It does not provide a new methodology for scientifically assessing disturbance or other recreation impacts, as this is a complex task, often requiring considerable time in order to assemble robust datasets.

Benefits of applying the Advice – potential outcomes

The advice could be used to:

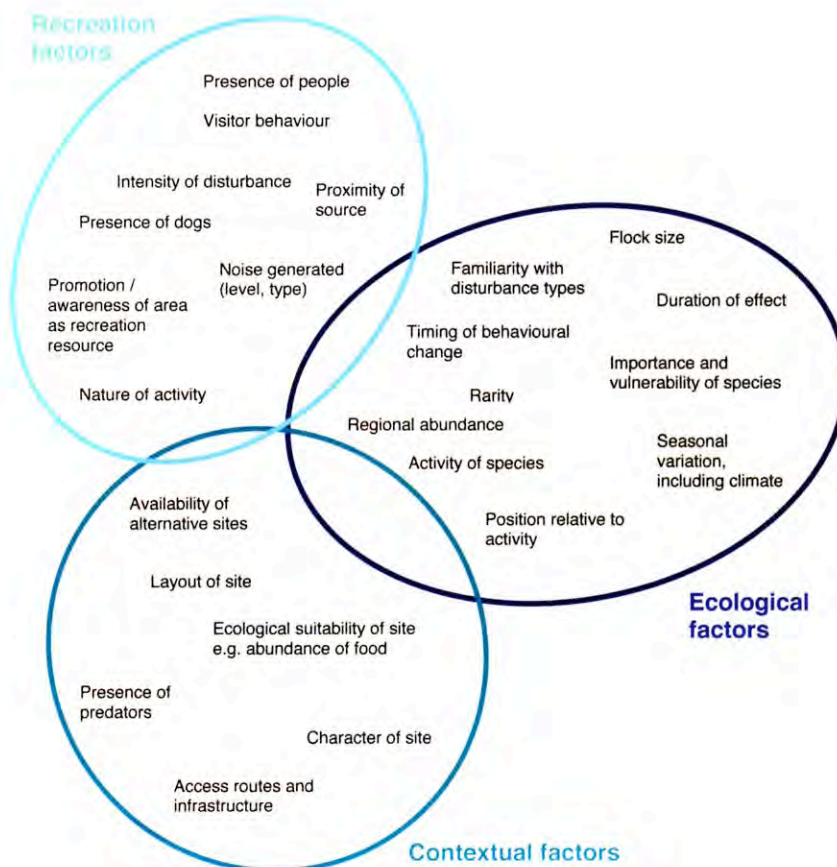
- clarify the impacts of access on sensitive natural heritage sites, (whether or not it is expected that this is either negative or significant at the outset of the study). Access rights are conditional on responsible behaviour, and there is an onus on land managers to also act responsibly with respect to access takers. As a result, monitoring should be used to help determine whether people are using and managing sites responsibly;
- provide a survey and monitoring framework which allows both the assessment of natural heritage responses to a one-off event, or baseline information to be assembled and used to monitor longer term effects over several years;
- provide feedback for users, helping them to better understand their impacts and stimulating more responsible behaviour where required;

- provide a sound basis upon which management responses can be based. Such evidence can help to overcome concerns that management choices are based on perceptions or prejudices.

It is hoped that the application of this advice will lead to more opportunities for consistent and comparable data to be gathered and assessed, thereby informing wider discourses on access and natural heritage at a regional / national level.

A summary of what is covered in the Advice

In order to understand the impacts of recreation on the natural heritage, it is important to take into account not only the scale and type of visitor activity, but also the characteristics of the site itself, and the nature of the species using it. Often the actual impacts of recreation are a complex interplay of visitor behaviour, types of activity, sensitivity and vulnerability of species, weather, availability of food, and spatial relationships. As a result, survey and monitoring needs to go beyond a simple description of what is happening or where it is happening, to provide much more detailed insights into the nature of visitors, the site and the species affected. Although the advice focuses on recreation survey and monitoring, it is important to consider any findings in relation to wider ecological and contextual information.



The advice introduces a range of tools which can be used to undertake monitoring of access and recreation:

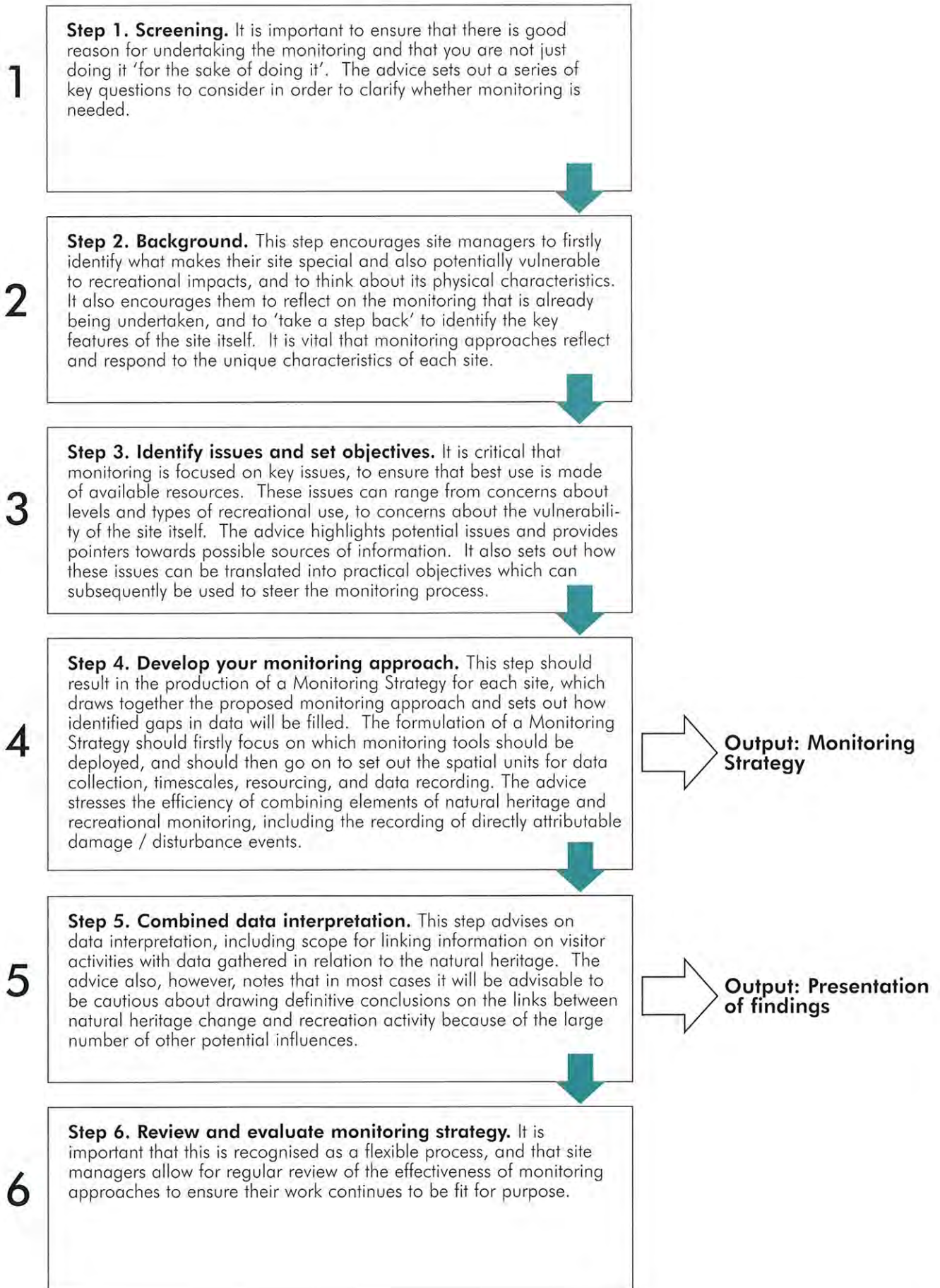
- Visitor counts
- Observation (of users and / or natural heritage responses)
- Recording the physical condition of a site
- Questionnaire surveys of users

The way that these tools are used depends greatly on a site's specific circumstances, the issues involved and the objectives of the monitoring. The advice therefore provides a process which site managers can follow to identify their own monitoring strategy.

Before embarking on the process of developing a monitoring strategy, the following key points should be noted:

- Recognise that although the aims may be aspirational, in almost all cases the monitoring strategy will be partly guided by the availability of resources. Efficiency is important, and site managers should seek to provide an approach that is 'fit for purpose' and therefore relevant to its resourcing context.
- Bear in mind that a smaller, more focused and specific monitoring process is likely to provide a more robust dataset than a broader, more descriptive study. Be realistic about what can be achieved and seek to gather empirical evidence where possible.
- Recognise that most monitoring strategies will benefit from partnership working, reflecting the organisations that might share responsibility for the management of the site or aspects of its monitoring. Involving user groups as well as managers in the design and application of the monitoring process can help to increase respect for the findings and adherence to any subsequent management decisions.
- Be clear about the purpose of survey and monitoring, as this will help guide important decisions including whether quantitative or qualitative tools are more appropriate, or whether data collection should be undertaken in a single period to provide a 'snap-shot' of activities or if it should run over a longer time-frame.
- Do not expect to draw definitive conclusions from your monitoring about natural heritage responses to recreation, unless you are devoting many years work to the process to produce a scientifically robust set of findings. Recognise instead that trends and 'warning signals' are sufficient to trigger management responses in many cases.
- Take a flexible approach. Most monitoring strategies will benefit from periodic review and should be amended to ensure they continue to reflect changing circumstances on the site.
- Recognise that researchers can cause impacts, including disturbance, and therefore design your approach to minimise or avoid this as far as possible.

Based on these working principles, the advice provides a simple, step by step process which can be followed in devising an appropriate approach to access and recreation monitoring, its analysis and review.



Throughout the step by step process, the advice provides Template forms which have been designed to be completed by the site manager, and together will form the basis of a Monitoring Strategy.

The advice finally notes that the findings of the monitoring will in some cases allay any concerns about a site, whilst in others it may trigger management action to reduce potential environmental impacts. The advice gives a flavour of the types of management action which could be explored further on the basis of monitoring findings. As part of this it emphasises the benefits of taking a positive approach, for example raising user awareness of potential impacts, before progressing to more stringent or regulatory action.

To provide as much practical assistance as possible, the advice provides pointers to good practice, illustrations from the Case Studies and Pilot Sites, and is supported by additional information:

- **Appendix 1**

- set of pro formas which could be used as a starting point for preparing aspects of visitor monitoring;
- findings from piloting the advice at Loch Leven, including a completed template which was used to define the monitoring strategy, and the interim monitoring strategy itself;
- contact details for all of the pilot sites that participated in the study;
- references to sources of further information.

- **Appendix 2** provides the full findings from the Literature Review and the Case Study work.

Monitoring Access and Recreation at Sensitive Natural Heritage Sites

The full Advice, including Tools, Templates and Pro formas is available online at:

www.snh.org.uk/publications/on-line/heritagemanagement/sensitivesites/

Scottish Natural Heritage is a government body, responsible to the Scottish Government and through them to Scottish Ministers.

Our mission statement:

Working with Scotland's people to care for our natural heritage.

Our aim:

Scotland's natural heritage is a local, national and global asset. We promote its care and improvement, its responsible enjoyment, its greater understanding and appreciation and its sustainable use now and for future generations.

Our operating principles:

We work in partnership by co-operation, negotiation and consensus, where possible, with all relevant interests in Scotland: public, private and voluntary organisations and individuals.

We operate in a devolved manner, delegating decision-making to local level within the organisation to encourage and assist SNH to be accessible and responsive to local needs and circumstances.

We operate in an open and accountable manner in all our activities.

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