

21. Moor and heathland: research, advice, management, creation and monitoring

If you are working on sites where there is peat or heathland, then Penny Anderson Associates Ltd. (PAA) has the expertise and experience to assist you in assessing quality, providing restoration plans and preparing contracts for repairing any damage. We specialise in integrating ecology, hydrology and earth sciences in this environment based on over 30 years of relevant experience.

Peatlands are the biggest carbon store in the country (it has been said that there is more carbon in them than in all the forests of England and France put together!), yet many areas are damaged through a variety of activities and they are not sequestering carbon adequately. Water discolouration is a major problem for water companies where reservoirs and rivers have peatland catchments, flood frequency and magnitude downstream can be increased and severe wildfire in summer can destroy large areas. Nature conservation and game interests are also compromised.

How PAA can help:

At PAA we have developed a specialism in this environment. We have researched, studied, developed new methods of assessment, prepared restoration proposals, conducted EIAs, negotiated successfully with statutory agencies, monitored the results of works and acted as clerk of works on the ground to a wide range of problems such as:

- Wildfire damage (some very old);
- The effect of Wind Farms on peat;
- Masts and radar installations on hill tops;
- Overgrazing issues;
- Generation of poor water colour;
- Downstream flooding;
- The effects of blocking grips, drains and gullies;
- Removing conifer plantations and restoring moorland or heathland habitats;
- Footpath erosion;
- Impacts of recreation on wildlife; and
- Quarries (slate, gritstone, silica sand).



Examples of projects include:

- Over 20 years research and monitoring of the Peak District National Park Moorland Management Project (incorporating mapping extent of damaged ground, restoration of different situations, monitoring of the results);
- Restoration of damaged peat after mast/radar and tracking installations in the Peak District, Scotland, Great Dun Fell and Wrekin;
- Advising on restoration and monitoring subsequent hydrological and ecological changes for the Sustainable Catchment Management Programme (SCaMP) for United Utilities for 5 years (report <http://www.unitedutilities.com/SCaMPdatalibrary.aspx>);
- Mapping grips and other peatland features from aerial photographs using GIS for all the North Pennines AONB;
- Application of LIDAR in identifying issues and restoration approaches;
- Restoring damaged ground after wildfire in the Brecon Beacons, Pennines and Peak District;
- Restoring damaged peat after wind farm development in South Pennines and West Lancashire;
- Restoration of dominant *Molinia* or *Nardus* to more diverse communities (Wales and the Peak District);
- Preparing EIA for wind farms to minimise damage to peat and identify suitable compensation works;
- EIA Forest Regs for restoring moorland and heathland vegetation from conifer plantations, including experimental work to restore heathland on an iron age fort; and
- Preparation of guidance on restoring and monitoring hydrology, managing grazing and provision of training courses on all aspects of moorland and heathland restoration and management.

For more information, please contact us: enquiries@pennyanderson.com

Related Brochure Inserts

Information is available summarising our expertise in the following related areas; please contact us if you require copies of any of these numbered brochure inserts:

1. Air quality impacts on ecological receptors. 2. Animals: protected and priority species and development. 3. Applied hydrology and development. 4. Aquatic invertebrates and biological water quality monitoring. 6. Birds and development. 8. Ecological survey and evaluation. 9. Ecological survey calendar 11. Environmental guidance and toolkits. 12. Environmental impact assessment. 13. Environmental method statements and ecological clerk of works. 14. Expert witness and public enquiry support. 16. GIS and digital mapping. 18. Habitat creation and restoration. 19. Habitat management planning. 20. Habitats regulations assessment. 22. Peatland survey and evaluation 23. Quarries and mineral workings: environmental services. 24. Literature and data reviews. 25. Soils and development. 26. Specialist invertebrate survey and services. 29. Vegetation survey and assessment. 30. Water Framework Directive and water quality monitoring. 32. Wind farms: environmental services. 33. Working in Wales: environmental services

