

# Demonstrating the 'Ecosystem Approach'

## Corporate Governance at Natural Resources Wales

The ecosystem approach to environmental management (Box 1) considers the whole landscape, including its environment, economy and society, to benefit both people and nature. This is one of a set of case studies that illustrates the ecosystem approach, its advantages, and challenges.

### Corporate governance: taking an ecosystem approach in Wales

The Forestry Commission Wales, Countryside Commission Wales, and Environment Agency Wales merged in 2013 to form Natural Resources Wales (NRW).



NRW now lead on all aspects of Welsh environmental management, and was formed to take an ecosystem approach to manage Welsh nature and land as a whole. The purpose of the organisation is "to ensure that the environment and natural resources of Wales are sustainably maintained, sustainably enhanced and sustainably used, now and in the future" (NRW, 2014).

NRW has developed five 'Good' programmes, three of which bring together people, the environment, and the economy to deliver benefits from natural resources. The programmes emphasise using-

- Good knowledge

So that what they do is

- **Good for the environment**
- **Good for people, and**
- **Good for business**

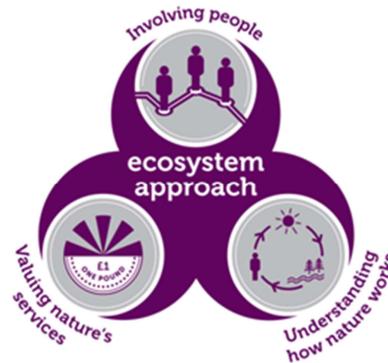
To make sure that they are a

- Good organisation

The programmes focus on the health of ecosystems, and keeping natural resource use within their limits of recovery. They aim for people to enjoy and benefit from natural resources and understand what nature does for us, and to integrate the economy within nature. So how are NRW applying an ecosystem approach?

#### *Involving people*

NRW aims for management of nature and natural resources that is focused around communities. Their 'Good for people' programme gives local people the opportunity to engage in decisions that concern their community,



### Box 1: An 'Ecosystem Approach'

*"The ecosystem approach is a strategy for the integrated management of land, water and living resources that promotes conservation and sustainable use in an equitable way."*

- Convention on Biological Diversity

The *ecosystem approach* is a way of managing natural resources. The environment around us is seen as one whole unit, comprising ecosystems and the way nature functions, and the people that live there. The ecosystem approach has twelve principles<sup>1</sup>, summarised as:

- *Involving people*
- *Understanding how nature works*
- *Valuing nature's services*

The ecosystem approach takes account of whole units, beyond administrative boundaries. What constitutes a 'unit' will vary, but will depend largely on ecosystem functioning; for example a river basin, the range of a population of a species, or whole woodland area.

The vision is that we will all play a part in our local environment to take care of nature, and the people that live within it.

particularly when this involves protected characteristics groups and deprived communities. They are aiming for community owned and partnership projects, which involve local people in place-based decisions, particularly focusing on land and water, where there are often many different stakeholders. Three trials are being carried out in different areas. Here, NRW is looking at how to engage with the public and other organisations and agencies on projects that use the natural environment to create better places and enhance quality of life for people.

NRW is also pushing for better access and enjoyment of nature in both urban and rural natural environments – an important aspect of improving our sense of place in nature. NRW emphasise both volunteering and educational opportunities, and making the links between a good quality environment and mental and physical wellbeing.

- **Advantages:** Working with people through the trial areas has helped NRW to develop ways of communicating the benefits that nature provides in an effective way.
- **Challenges:** NRW faces the challenge of being a national organisation, and engaging with groups at different scales, from the very local to the national level. Through local trials NRW have been investigating how to link up national policy priorities with local interests. This work will inform the approach to area based working under the new Environment Act.

### *Valuing nature's services*

NRW demonstrates that they value nature in many different ways. Having integrated the Forestry Commission Wales, commercial forestry is an example of one way of valuing nature – as a provider of goods. The emphasis on recreation is another, valuing nature for its cultural surroundings; and recognising natural resources such as wind and water for providing us with sources of energy is a third example of valuing nature's services. Under the Environment Act, NRW will be producing periodic State of Natural Resources reports, allowing them to account for the full value of what nature provides, and to produce maps to underscore decision-making.

Finally, emphasising the 'polluter pays principle' - whereby the actors causing harm to the environment are responsible for paying to restore it to good health - recognises the value of nature's services. When harm is done, nature can no longer provide the benefits that we enjoy, and it is important to recognise the value of maintaining these services free from pollutants. The polluter pays principle is an incentive for good practice, and supports the care and wise use of nature.

- **Advantages:** The State of Natural Resources report and natural resource maps create practical tools for illustrating the wealth that exists in nature. These tools explain the value of nature to wider audiences in a way that takes a broader definition of 'value', beyond money. This enables people to integrate ecological function with well-being and describe the value of nature in these terms as well.
- **Challenges:** It is difficult to communicate the idea of assigning value beyond monetary calculations. To overcome this, NRW is trying to base discussions of the value of nature around land use and real choices, to try to use a range of ways to draw out different types of values.

### *Understanding how nature works*

The health of ecosystems as a whole is paramount to NRW. A major goal is to use the ecosystem approach on the land and water that NRW manages, such as National Nature Reserves, forest estates, and flood defences. A 'Good environment' is one in which "ecosystems are resilient and secured for the future, wildlife and landscapes are enhanced, and the use of our natural resources is carefully managed" (NRW, 2014). Ensuring that ecosystems are resilient and secured for the future shows a commitment to long-term ecosystem health, where nature is able to continue to provide the benefits that we rely on. Carefully managing natural resources, likewise, is ensuring that we do not over-exploit, and remain within nature's limits. The State of Natural Resources reports will help to ensure that Wales remains committed to a resilient, functional environment.

One goal is to "improve the connectivity and restoration of priority habitats (such as deep peat) and their linkages as part of area-based natural resource management plans" (NRW, 2014). NRW show that it is important to choose the right scale to manage. Ensuring and improving connectivity and linkages recognises the

width and breadth of natural processes, and that managing nature within artificial administrative boundaries does not take into account how ecosystems function.

Finally, NRW take a flexible approach. Their corporate plan recognises that the uncertainties of, for instance, climate change, and pests and diseases are a great challenge, and they must be prepared to adapt to tackle them. This makes the health of the ecosystems the most important thing, as opposed to man-made priorities.

- **Advantages:** With the Environment Act, it will become necessary to look at a more holistic picture, for example for development plans. It will become possible to feed information on the environment into local and national development plans, allowing for much more informed decisions.
- **Challenges:** There are gaps in how much we know about our complex natural systems. The more complete the picture that we work with, the more complicated it is, and it can be difficult to consider the many different aspects of social and ecological systems.

### **An ecosystem approach**

The ecosystem approach is clearly embedded in Welsh public policy on the environment. The Environment (Wales) Bill was recently signed into law, and “through the concept of sustainable management the Bill puts the ecosystem approach on a statutory basis” (Welsh Government 2015: 9). Wales is now committed to an integrated approach to managing their land and natural resources.

### **MORE INFORMATION**

NRW (2014). Corporate Plan 2014-2017. Natural Resources Wales. Online:

<https://naturalresources.wales/media/3298/corporate-plan-2014-17.pdf>

Welsh Government (2015). Natural Resources Policy Statement. Online:

<http://gov.wales/docs/desh/publications/150914-natural-resources-policy-statement-en.pdf>

<sup>1</sup> **The twelve principles were created by the Convention on Biological Diversity, and are intended to help implement the ecosystem approach. They have been adapted to provide an evaluation framework for applying the ecosystem approach and have also been translated into Plain English; for more information click [here](#).**



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