

The Forestry Commission is already playing an important role in combating climate change, and in helping our forests adapt to the changing climate

5 The role of the Forestry Commission and climate change: a summary

The Forestry Commission is already playing an important role in mitigating climate change and adapting to its impacts.

What is the Forestry Commission doing about climate change?

The Forestry Commission is tackling climate change through a six point action plan. Some of these actions are directly relevant to our work in managing the public forest estate in Britain, while others are achieved through influencing the international forestry and climate change agenda.

Reducing deforestation

By tackling the causes of deforestation we can reduce the rate and amount of loss of forest cover. We also need to conserve and manage existing forests to protect and maintain the carbon already locked up in them.

Forest Research (the Forestry Commission research agency) is currently carrying out work to establish the best methods of managing woodlands to store carbon.

Protecting and managing the forests we already have

To protect our existing forests and woodlands they need to be sustainably managed. The Forestry Commission has set out its vision for forests and woodlands in the UK and defined the legal and good practice requirements for sustainable forest management in the UK Forestry Standard and its supporting Guidelines (due to be published in 2010). The series will include a guideline on forests and climate change for the first time. Sustainable forestry practices can be demonstrated using independent certification schemes. The UK is a world leader in forest certification - we were the first country in the world to have all of our public forests - those managed by the Forest Commission and Forest Service – independently certified as sustainably managed. Wood from our forests carries a label showing just that.

Restoring woodland cover

The planet's forest cover can be restored by planting new forests and re-establishing those that have been lost. The Forestry Commission is sharing its knowledge through the Global Partnership on Forest Landscape Restoration to help make a difference at an international level.

The Forestry Commission is developing a code of good practice for forest carbon projects to ensure woodlands planted to store carbon are managed sustainably, to allow us to measure the amount of carbon they are storing and to ensure they are monitored regularly.

In England, the Low Carbon Transition Plan states that If we could create an additional 10,000 hectares of woodland per year for 15 years, those growing trees could remove up to 50 million tonnes of carbon dioxide between now and 2050. In Scotland the government plans to increase the woodland cover from 17% in 2006 to 25% by 2050.

In Wales, the Welsh Assembly Government is developing plans to increase woodland cover by around 100,00 hectares (from 14% to 19%) between 2010 and 2030. Native deciduous trees and conifers, that are well adapted to the future climate, will be planted in addition to some natural regeneration.

Using wood for energy

Forestry and woodfuel strategies in England, Scotland and Wales set out how the Forestry Commission is:

- providing woodland owners with the practical advice and skills required to make informed choices about managing their woodlands to produce woodfuel;
- providing advice on using woodfuel boilers;
- encouraging the market for logs, chips and pellets to develop.

Grant Schemes in Scotland and Wales are providing funding for:

- installing biomass heating;
- installing combined (electricity and heat generation) biomass units;
- developing the woodfuel supply chains.

Replacing other materials with wood

Research currently being carried out by the Forestry Commission's research agency, Forest Research, includes modelling the benefits of replacing other materials with wood. This research is being transferred into a 'Carbon toolkit', or calculator to summarise the total carbon benefit of timber, in the forest, in timber products (including the effect of substituting for other building materials) as well as in woodfuel.

Planning to adapt

Current research programmes include:

 The development of Ecological Site Classification tools to assess the likely impacts of climate change on the suitability of individual tree species and native woodland communities.

- Analysis of how climate change may alter the impacts of pests and diseases on trees and woodlands.
- Investigating the ability of our native species to adapt to climate change.
- Investigating the best tree species for future climates in urban environments.

Forestry and climate change research

The Forestry Commission's research agency, Forest Research, has carried out climate change focused research for many years. Its role in this area has now been further strengthened by the creation of a dedicated Centre for Forestry and Climate Change.

Forest Research's programme of climate change-related research is wide-ranging, covering impact assessment and monitoring, adaptation and mitigation. The scope of the research includes forest management, biosecurity, the management of woodland for biodiversity and the services that trees and woodlands provide to society.

The Read Report

An independent assessment was commissioned by the Forestry Commission to examine the potential of the UK's trees and woodlands to mitigate and adapt to our changing climate. It forms part of the UK response to the Intergovernmental Panel on Climate Change (IPCC) 4th Assessment Report published in 2007.

The IPCC report provided authoritative evidence of how planting and managing woodland, avoiding deforestation, and replacing fossils fuels and carbon-intensive products with wood can make a major contribution to mitigating the effects of climate change. It also examined the impacts of climate change on forests, and the importance of adaptation to make forest ecosystems more resilient.

However, the IPCC report was global in scope and it highlighted a need to bring together information at the national level – to assess what climate change means for forests and woodlands in the United Kingdom, and to identify the gaps in our knowledge. Combating Climate Change – A Role for UK Forests (also known as the Read Report) aims to provide a better understanding of how UK forestry can adapt to and improve its contribution to mitigation of climate change, with the following specific objectives:

- Review and synthesise existing knowledge on the impacts of climate change on UK trees, woodlands and forests.
- Provide a baseline of the current potential of different mitigation and adaptation actions.
- Identify gaps and weaknesses to help determine research priorities for the next five years.

The Assessment was compiled by a number of leading scientists coordinated by an independent steering group of forestry and climate change experts from the UK and overseas, chaired by Professor Sir David Read, formerly Vice President of the Royal Society. The full report and synthesis report can be ordered and/or downloaded from: www.tsoshop.co.uk

