Action needed to prevent more devastating tree diseases entering the UK

October 31 2012

The UK Government has recently imposed a ban on importing foreign ash trees in order to prevent the spread of fungal disease Chalara, which kills the trees and has entered the country via imports from Europe.

Imperial College London researchers argue that the nursery trade, horticultural stakeholders and the plant buying public need to be more aware of the risks to tree health posed by imported plant pathogens. They say it is far better to prevent the entry of a tree disease than to attempt to contain it once it is established.

Based on the findings of a report published in 2011, the researchers stress the need for much more public debate about the issue of biosecurity and measures that will put in place tougher international regulation to protect our rural environments.

They also say there must be more engagement with the problem among conservation groups and agencies, plant lovers and garden designers and people in the horticultural trade.

Dr Clive Potter from the Centre for Environmental Policy at Imperial College London, who led the study, said: "We acknowledge there must be a trade-off between the desire to import trees and ornamental plants from abroad and the need for measures that effectively keep diseases at bay, but it is vital that we act."

He expressed particular concern about the emerging risks to tree health

from a number of [insect pests](#) and [disease pathogens](#), including ash dieback, that have recently entered the UK or are at high risk of introduction in coming years.

Social and natural scientists working with the UK Research Councils' Rural Economy and Land Use Programme and the Government's Department for the Environment, Food and Rural Affairs (DEFRA) spent almost three years looking back at the outbreak of Dutch Elm Disease that ravaged the UK in the 1970s and considering the implications for newly emerging plant diseases such as [Sudden Oak Death](#).

Despite its name, Sudden Oak Death affects a wide range of trees and shrubs, including beech, ash, yew, rhododendron, magnolia and bilberry. It kills by creating cankers which girdle the trunk or stem, clogging up their water-carrying 'veins'. Records show the disease has wiped out millions of trees in the forests of California and Oregon in the USA since the 1990s and now its impact on UK ecosystems, biodiversity and the national landscape could be severe.

Studies in the UK reveal a pattern of Sudden Oak Death infection and disease spread which the scientists believe could lead to a national epidemic with consequences similar to those experienced with Dutch Elm Disease. .

Dr Potter explained: "Despite important biological differences between Dutch Elm Disease and Sudden Oak Death, we are very worried by the growing parallels between the two outbreaks. Whereas Dutch Elm Disease rapidly became uncontrollable because of its ability to spread very quickly across a given host range, Sudden Oak Death is proving equally uncontainable due to its capacity to infect new types of plant host species.

"Valuation surveys from our research suggest a lack of public awareness and this translated into an unwillingness to pay for control measures. Public awareness needs to be raised, not only in order to establish a stronger sense of personal responsibility for preventing the spread of [plant diseases](#), but also to elicit more support and a greater willingness to pay for any more restrictive measures and policies that may be necessary in the future if we are to avoid another epidemic like [Dutch Elm Disease](#)."

Provided by Imperial College London