Vodafone teams up with Defra for digital tree monitoring trial
03 August 2020

The project will see specialist sensors strapped to trees to collect data | Credit: Vodafone / Defra

Telecoms giant to provide Internet of Things sensors to aid research into tree growth and their potential for carbon for CO2 storage

The government is teaming up with Vodafone to carry out a three-month study using specialist sensors to monitor tree growth and the impacts of environmental change on the UK's forests, the telecoms giant announced last week

Spearheaded by the Forestry Commission's research agency, Forest Research, the project aims to help build understanding of the health of forests, as well as their potential to store carbon dioxide, it said. The project will see Internet of Things (IoT) sensors provided by Vodafone attached to trees in forests in Sussex and Northumbria, with the aim of collecting "vast amounts of data" to gauge how temperature, humidity and soil moisture impacts tree growth, according to Anne Sheehan, director of Vodafone Business UK.

"Tackling climate change requires radical thinking and our forests will be vital to this," she said. "Our IoT technology enables us to connect trees and monitor performance, which is a perfect example of how technology can be used in new ways to help create a more sustainable future."

Matthew Wilkinson, a research scientist at Forest Research, said the IoT monitoring project had the potential to transform the way tree data is collected and analysed, removing the need for frequent site visits due to data being digitally sent directly from the tree sensors.

"The project also will help us gather more data which is critical to targeting efforts to measure the contribution of individual trees to climate change," he added. "If the trial is successful, we hope it will expand to other areas of environmental monitoring and signify a step change in the amount of data we are able to collect and analyse."

Tree planting, protection, and afforestation have risen to increasing prominence in the government's climate and environmental policy plans in recent years. Ministers have pledged to increase tree planting across the UK to 30,000 hectares per year by 2025, and recently announced a £640m Nature for Climate Fund that will invest in environmental restoration, including tree planting, over the next five years as part of promised 'green recovery' plans.

Source:https://www.businessgreen.com/news/4018484/vodafone-teams-defra-digital-tree-monitoring-trial