



Media release

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## **20-year research project reveals devastating loss of Irish flora**

The new Plant Atlas is the most powerful statement ever produced on the state of our wild and naturalised plants

Thousands of botanists from the Botanical Society of Britain and Ireland (BSBI)<sup>1</sup> have spent the last twenty years collecting data on changes in the British and Irish floras. The results have now been published in *Plant Atlas 2020*. Three main trends emerged from the Irish data.

- Most Irish native<sup>2</sup> plant species (56%) have declined in range and abundance or both.
- Native grassland plants are those that have suffered the most, but many plants of lakes and wetlands have also declined.
- In contrast, the overwhelming majority (80%) of species introduced into Ireland since 1500 have increased. Most of these non-native species are benign but some, such as Himalayan Balsam and Rhododendron, have become invasive, with a negative impact on the native flora.

*Plant Atlas 2020* is the most in-depth survey of the British and Irish flora ever undertaken. It builds on two previous Atlas surveys<sup>3</sup> undertaken by the BSBI in the twentieth century.

Julia Hanmer, BSBI Chief Executive, says "*Plant Atlas 2020* presents a powerful and concerning insight into the changing distributions of our wild plants. In Ireland, nearly 3 million plant records of 1939 species, collected by 2,500 botanists, fed into the Atlas project. The dedication and expertise of our recorders, combined with the in-depth knowledge of scientists at BSBI and BRC<sup>4</sup>, provides a unique contribution to the evidence base needed to underpin nature recovery and highlights the urgent need for action to ensure that going forwards our wild plants thrive and are valued."

Many of the habitats Irish wild plants depend on have been destroyed or altered by farming and forestry since the 1950s. Grassland plants have been impacted the most. Re-seeding, over-fertilising, nitrogen deposition, herbicides, soil drainage, and changes in grazing pressure have all contributed to the decline of species like Agrimony, Field Gentian, Marsh Lousewort and many others. Lakes and wetlands

have also been affected; some lakes are now dominated by the few aquatic plants favoured by nutrient enrichment, such as the introduced Nuttall's Pondweed. Many peatbogs have been planted with conifers or converted to agriculture, excluding the native bog plants such as heathers and sundew. Peatland habitats are important for carbon storage, and their restoration is essential as part of our efforts to combat climate change. There is evidence that climate change may have affected the Irish flora by helping some southern species to spread northwards.

Dr Micheline Sheehy Skeffington, BSBI President, says: "*Plant Atlas 2020* is a massive achievement<sup>5</sup>, but it must be seen as a wake-up call for action. Plants are the basis of all biodiversity. The results of this unprecedented survey<sup>6</sup> will inform our Governments and help strengthen their work to conserve plants and the habitats on which they depend. We are also working with the wider public, providing training<sup>7</sup> and resources to help people understand more about Ireland's wild plants".

Dr Kevin Walker, BSBI Head of Science and *Plant Atlas 2020* co-author, says: "There's lots we can do to reverse these declines, but the most important are to increase the protection plants receive, extend the habitat available to them, and to place their needs at the very heart of nature conservation. We also need to ensure that our land, water and soil are managed more sustainably so that plants, and the species which rely upon them for food and shelter, can thrive. *Plant Atlas 2020* provides the evidence we need to do this important work, but we'll need even more research and monitoring to help better conserve our wild plants and their vitally important habitats in the decades to come".

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#### Editor's notes

1. The Botanical Society of Britain and Ireland (BSBI) is the leading charitable organisation promoting the enjoyment, study and conservation of wild plants in Britain and Ireland. We aim to build a diverse community of skilled and enthused botanists; provide data and science to help address biodiversity loss and climate change; and disseminate information to drive a passion for plants. We provide opportunities for involvement through a range of participation projects, surveys, events, training opportunities and the production of books and other resources. Our Distribution Database holds over 50 million plant records, making it one of the world's largest biological recording databases. [www.bsbi.org](http://www.bsbi.org)
2. Of the 1,939 different plant species recorded in Ireland during *Plant Atlas 2020* fieldwork, 952 are native to Ireland and 987 non-natives were recorded; this comprises 890 recent introductions, many of which originate from gardens and then spread to establish self-sustaining populations, and 97 ancient (pre-1500) introductions.
3. BSBI published two previous plant distribution atlases, the first in 1962, based on data collected from 1950 to 1960, and the second in 2002, based on data collected from 1987 to 1999. [www.bsbi.org/atlas-2020](http://www.bsbi.org/atlas-2020)

4. The *Plant Atlas 2020* project outputs comprise an online Atlas, separate summary reports for Britain and for Ireland, and a 2-volume book. The [online Atlas](#), which goes live at 3pm GMT on 8th March, was created and is hosted by the Biological Records Centre at the UK Centre for Ecology & Hydrology, and features interactive distribution maps, text and graphics displaying the phenology, altitudinal range, and time-series trends. To access the test version of the online Atlas, please visit <https://plantatlas2020.org/user/login> and use username bsbiibsb and password bsbiibsb to log in.
5. The 2-volume book, *Plant Atlas 2020: Mapping Changes in the Distribution of the British and Irish Flora*, is published on 21<sup>st</sup> March by the BSBI in partnership with Princeton University Press and The Wildlife Trusts: [www.press.princeton.edu/books/hardcover/9780691247595/plant-atlas-2020](http://www.press.princeton.edu/books/hardcover/9780691247595/plant-atlas-2020)  
The authors are: **P. A. Stroh**, scientific officer at the Botanical Society of Britain and Ireland; **K. J. Walker**, head of science at the Botanical Society; **T. A. Humphrey**, database officer at the Botanical Society; **O. L. Pescott**, plant ecologist and data analyst at the UK Centre for Ecology & Hydrology; and **R. J. Burkmar**, web developer at the UK Centre for Ecology & Hydrology.
6. The Ireland report summarises the key findings and trends impacting the current state of the Irish flora, assesses the changes since the 1950s and analyses the drivers of change, such as habitat loss, pollution and climate change. [https://bsbi.org/wp-content/uploads/dlm\\_uploads/2023/02/BSBI-Plant-Atlas-2020-summary-report-Ireland-WEB.pdf](https://bsbi.org/wp-content/uploads/dlm_uploads/2023/02/BSBI-Plant-Atlas-2020-summary-report-Ireland-WEB.pdf)
7. BSBI offers training events across Ireland, such as the Aquatic Plant Project, funded by the National Parks & Wildlife Service. <https://bsbi.org/aquatic-plant-project>
8. For more information about the *Plant Atlas 2020* project in Ireland, please contact Micheline Sheehy Skeffington, BSBI President: email [michelinesheehy@gmail.com](mailto:michelinesheehy@gmail.com), tel: +353 86 2202555.
9. For more information about the *Plant Atlas 2020* project in Northern Ireland, please contact John Faulkner, email: [jfsglobalnet.co.uk](mailto:jfsglobalnet.co.uk), tel: +44 28 3889 1317
10. For more information about the *Plant Atlas 2020* project across Britain and Ireland, or to arrange interviews with *Plant Atlas 2020* authors, please contact Louise Marsh, BSBI Communications Officer: email [louise.marsh@bsbi.org](mailto:louise.marsh@bsbi.org), tel: 07725 962 957.
11. Register for the Ireland launch at the National Botanic Garden, Glasnevin, Dublin on 9th March here: <https://www.tickettailor.com/events/botanicalsocietyofbritainireland/846233>
12. Register for the Northern Ireland launch at the National Museum of Northern Ireland, Holywood, on 15th March here: <https://www.tickettailor.com/events/botanicalsocietyofbritainireland/846232>
13. A selection of images and a social media pack can be found here: <https://www.dropbox.com/scl/fo/9jeoxb2qc9xq42zb8ix2p/h?dl=0&rlkey=yfjxj3g8qn5pmecjb8kxasc4h>