**XTRABYTES** 

## Áras an Uachtaráin Biodiversity Audit

Since Covid-19 restrictions on outdoor work were lifted on 18<sup>th</sup> May, a team of ecologists from the Zoology and Botany departments have been furiously recording all the birds, mammals, invertebrates, grasses, sedges, herbs, ferns and as many other lifeforms as they could possibly identify in Áras an Uachtaráin.

The objective of this project was to identify and map the different habitat types that are present in the Áras, to generate comprehensive species lists, and make recommendations for future management actions to improve biodiversity on site. The project is in its final stages, with report writing nearing completion, and we hope to be able to present our findings and recommendations to President Higgins in the very near future.



**Figure 1** Lady's bedstraw (*Galium verum*) growing in "The Arboretum" grasslands. Photo: Aoibheann Gaughran.



**Figure 2** The Pond at Áras an Uachtaráin, looking towards the Large Paddock. Photo: Aoibheann Gaughran.

The 130-acre site comprises a mosaic of habitats including mixed woodlands and parkland, semi-natural grasslands, paddocks, ornamental gardens and an organic kitchen garden. Project findings will follow at a later date. However, among some of the most notable species recorded (and I'm trying not to be biased!) were Hairy St. John's Wort (*Hypericum hirsutum*) which has extremely limited distribution in Ireland and is subject to a Flora Protection Order, some lovely arachnids including the cave spider (*Meta menardi*) and badger "day-bed" (Ahhh, there's my bias!).

I think we all appreciated being part of this project, particularly during COVID times, since it gave us an opportunity to get on with our work over the summer, something many of us in TCD have been denied. It also allowed us to spend time immersed nature and quiet green spaces which, personally speaking, has been fantastic for looking after my mental health in what are really trying times.

Please enjoy some photographs from our fieldwork.

## Dr. Aoibheann Gaughran

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**Figure 3** Hairy St. John's Wort (*Hypericum hirsutum*) and attendant hoverfly. Photo: Aoibheann Gaughran



**Figure 4** Pseudoscorpions (*Chthonius ischnocheles* and *Neobisium carcinoides*), flower crab spider (*Misumena vatia*) and the cave spider (*Meta menardi*). Photos: Simon Hodge and Aoibheann Gaughran.



**Figure 5** Wildflowers Hairy St. John's Wort (*Hypericum hirsutum*), Pyramidal Orchid (*Anacamptis pyramidalis*) and Broad-leaved Helleborine (*Epipactis helleborine*), growing in the grounds of Áras an Uachtaráin



**Figure 6** Badger "day-bed" or nest at the entrance to the old Ice House. Photos: Aoibheann Gaughran.



**Figure 7** Seven-spot ladybird (*Coccinella septempunctata*) life stages record at the Áras - larva, pupae, newly-emerged adult and mature adult. Photos: Aoibheann Gaughran



**Figure 8 Prof. Nicola Marples** and **Fionn Ó Marcaigh** mist netting and ringing birds under licence (Photos: Maxwell Photography, Aoibheann Gaughran, Maxwell Photography).



**Figure 9** Trevor Hodkinson surveying the wet grasslands around Nut Island. Photo: Aoibheann Gaughran



Figure 10 Bat caught foraging on trail camera in "The Wilderness" woodlands.



**Figure 11** Mammals observed on trail camera in the Áras. Top left to bottom right: adult fox, fox cub, fox and badger together, brown rat, rabbit, adult badger, pygmy shrew, woodmouse and juvenile badgers.



**Figure 12** Lepidoptera photographed in Áras an Uachtaráin. Top left to bottom right: newly emerged white (Pieris sp.) silver washed fritillary (*Argynnis paphia*), common blue (*Polyommatus icarus*), hibernating herald moths (*Scoliopteryx libatrix*), speckled wood (Pararge aegeria), holly blue (*Celastrina argiolus*), peacock (*Inachis io*) and 6 spot burnet moth (). Photos Aoibheann Gaughran, Trevor Hodkinson and Jane Stout.