#### **KINGHORN BIODIVERSITY MONTHLY REPORT - MAY 2022**



Wild Garlic (Allium ursinum) in flower in woodland by the Loch, 8 May 2022. Photo Robert Mill.

The Met Office (2022) reported that May 2022 was the fifth warmest on record in the UK by mean temperature, although that's probably not how local people think of the month just gone! The reason is that although *daytime* temperatures were not particularly noteworthy and there were some days with a decidedly chilly wind, the mean *overnight* temperature was significantly above average all over the UK, particularly in Scotland and N England. Even daytime temperatures along the east coast were (believe it or not!) slightly above average. Sunshine hours, however, were rather below average. Rainfall amounts for most of Scotland except the northwest were average (a pocket around Largo Bay and across the other side of the Forth from there had below-average rainfall, but Kinghorn and Kirkcaldy were just outside of this area and had average amounts).

Sixteen more species were added to the Loch list during May: 1 fly, 1 aphid, 1 gall mite, 2 snails, 1 rust fungus, 1 slime mould and 9 flowering plants. However, one accidentally duplicated entry had to be removed from the records. Therefore, between 30 April and 31 May there was a net increase of 15, from 1,313 to 1,328. 'New Loch record' is abbreviated NLR, especially in figure legends.

## **AROUND THE LOCH**

**Birds:** Fifty bird species were recorded at or around Kinghorn Loch during May. The arrival of **summer migrants** at the Loch has probably now finished for the year, with three **Swifts** finally seen flying over The Ecology Centre on 13th (Leo de Feu, Kinghorn and District Wildlife Group Facebook Page, abbreviated KDWG). **Blackcaps, Chiffchaffs, Common Whitethroats** and **Willow Warblers** all continued to sing, but no-one seemingly reported **Sedge Warbler** at the Loch during May. As well as the Swifts, **Swallows** (4th, 12th, 14th) and **Sand Martins** (12th) were seen but **House Martins** were not reported. Leo de Feu observed a **Kestrel** at the Loch on 13th, the only raptor recorded during May. Notable **ducks** included a single drake **Pochard** (possibly the same bird?) on both 2nd and 9th (Paul Williams) and a female **Goosander** on 11th (Tim Nicholson, KDWG). **Tufted Duck** were seen on three dates (2nd, 9th and 12th), with a pair present on 12th and four on 9th. No **Little Grebes** were seen during May but, after being apparently absent for almost the first three weeks, **Great Crested Grebes** reappeared from 20th and began nest-building. Their first, unsuccessful, attempt was near last year's site but they soon set up home on a raft also shared by a nesting **Mute Swan**. A pair of **Jays** was seen near the hide on both 2nd and 9th (Paul Williams), with a single bird also seen on 1st

(Tim Nicholson, KDWG). A small flock of **Linnets** was on the Rodanbraes on both 2nd and 9th (Paul Williams), while **Skylark** was heard singing in the vicinity of the Loch on three dates and a **Meadow Pipit** was seen on 2nd (Paul Williams). Paul also saw a **Yellowhammer** on 9th. The full list of birds recorded at the Loch during May 2022 is: *Barn Swallow, Blackbird, Blackcap, Blue Tit, Bullfinch, Carrion Crow, Chaffinch, Chiffchaff, Coal Tit, Collared Dove, Common Kestrel, Common Magpie, Common Pheasant (Ring-necked), Common Starling, Common Whitethroat, Coot, Dunnock, Farmyard / hybrid geese, Feral Pigeon, Goldfinch, Goosander, Great Crested Grebe, Great Tit, Greenfinch, Grey Heron, Grey Wagtail, Greylag Goose, Herring Gull, Jackdaw (Eurasian), Jay (Eurasian), Lesser Blackbacked Gull, Linnet, Mallard, Meadow Pipit, Moorhen, Mute Swan, Pied Wagtail, Pochard, Robin, Rook, Sand Martin, Skylark, Song Thrush, Swift, Tree Sparrow, Tufted Duck, Willow Warbler, Wood Pigeon, Wren, Yellowhammer.* 

**Mammals and amphibians:** The only May Loch records of these of which I'm aware were of **Rabbit** (1st, Paul Williams), **Brown Hare** (28th, Paul Bird) and **Grey Squirrel** (12th & 25th, Tim Nicholson).

# Invertebrates ('minibeasts'):







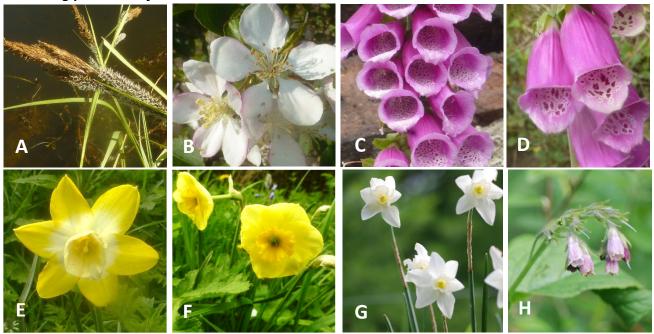




New invertebrate records, Kinghorn Loch area, May 2022. A, Copse Snail (*Arianta arbustorum*), 22nd. B, Gall of a mite, *Cecidophyes rouhollahi*, causing twisting of the leaves of Goosegrass (*Galium aparine*), 12th. C, Garden Snail (*Cornu aspersum*), 8th. D & E, The fruit fly *Tephritis neesii*, 8th. Photos Robert Mill.

It was another rather disappointing month for invertebrates. The only butterflies were Orange Tip (8th, 14th) and Small White (14th), and the only moth was a Nettle-tap photographed by myself on 8th. Bees and wasps were more evident, with Buff-tailed Bumblebee, Early Bumblebee (29th - very late, despite its name), Garden Bumblebee (4th), Tree Bumblebee (4th) and Common Wasp (4th) all being seen. Hoverfly records were few - Melanostoma scalare on Dandelion (4th) and Rhingia campestris on Evergreen Alkanet on the Rodanbraes track (4th) being my only sightings. The month's other **fly** records included one new Loch record, a fruit-fly called **Tephritis neesii** found on its principal host plant, Ox-eye Daisy, on 8th, as well as two records of the midge Chironomus plumosus (8th, 12th) that confirmed earlier records (Edwards, 1985) dating back nearly forty years. St Mark's Fly (Bibio marci) and Bluebottle (Calliphora vicina) were noted on 8th, and a live adult of Euleia heraclei (as opposed to its far more commonly seen larval leaf-mine on Hogweed leaves) on 4th, on the larval host. A winged adult aphid found on a Russian Comfrey leaf was most likely Alkanet Aphid (Ovatomyzus boraginacearum), a NLR and whose hosts include comfrey as well as alkanet. A photo is on page 4, in the section on cryptogamic plants, as it was on the same leaf as a new rust record for the Loch! Common Froghopper (Philaenus spumarius) 'cuckoo-spit' began to appear from 22nd. As in April, a Seven-spot Ladybird (Coccinella septemguttata) on 8th was the only beetle record. Other insect records included a Large Red Damselfy (Pyrrhosoma nymphula) photographed by Stephen Sorbie (KDWG) on 6th and a Common Earwig (Forficula auricularia) found by myself on 14th. The distinctive galling of the leaves of Goosegrass by the gall mite *Cecidophyes rouhollahi* – a new Loch record – was seen on 12th and was a NLR. Perhaps the month's most surprising NLR was that of Garden Snail (Cornu aspersum) at Craigencalt Farm on 8th – surprising because it is such a common species. Copse Snail (Arianta arbustorum), found on a dandelion flowerhead on 22nd, was also a NLR.

## Flowering plants and ferns



Loch plants, May 2022. All except D and H are NLRs. A, Lesser Pond Sedge (*Carex acutiformis*), 4th. B, Orchard Apple (*Malus domestica*), 4th. C, *Digitalis* 'Foxy Hybrid', 29th. D, Typical wild Foxglove (*Digitalis purpurea*), 29th, for comparison with C. 'Foxy Hybrid' has smaller, more densely packed flowers that are much less downward-pointed and have an opening that is more rectangular. E, *Narcissus* cf. 'Pipit', 8th. F, *Narcissus* cf. 'Sun Disc', 4th. G, *Narcissus* cf. 'Crystal Blanc', 22nd. H, Russian Comfrey (*Symphytum* × *uplandicum*), 12th. Photos Robert Mill.

Four ferns (Male Fern, Wall Rue, Hart's-tongue and Common Polypody) and both Field Horsetail and Water Horsetail were found in May. 117 species of flowering plant were found around the Loch in May, together with another six that were obviously cultivated. Nine of the 117 were new Loch records. Lesser Pond Sedge (Carex acutiformis; 4th onwards), Orchard Apple (Malus domestica; 4th onwards), Wallflower (Erysimum cheiri, 8th), Columbine (Aquilegia vulgaris; 12th, found in dark purple and pink forms), and Ivy-leaved Toadflax (14th) are all either British natives or very frequently escaped or naturalised all over the UK. The remaining four, Digitalis 'Foxy Hybrid' and three different narcissi cultivars (two belonging to the Jonquilla group and resembling 'Sun Disc' [4th] and 'Pipit' [8th]; the third larger, flowering later (22nd) and belonging to a different, relatively large-cupped group, and resembling 'Crystal Blanc'), had obviously originally been planted, either by TEC or Craigencalt Trust depending on where they were found, although all were in otherwise 'wild' areas such as woodland or roadside banks. In fact, the Digitalis hybrid appeared to be self-seeding as some of the plants were found growing out of the stones of the jetty wall. A selection of species noted flowering for the first time in May 2022 includes Hedge Parsley (Anthriscus sylvestris) and Field Pennycress (Thlaspi arvense) from 4th, Horse Chestnut (Aesculus hippocastanum), Rowan (Sorbus aucuparia), Lesser Trefoil (Trifolum dubium), Germander Speedwell (Veronica chamaedrys), Strawberry (Fragaria vesca), Hairy Vetch (Vicia hirsuta) and Holly (Ilex aquifolium) all from 8th, Hedgerow Cranesbill (Geranium pyrenaicum), Russian Comfrey (Symphytum × uplandicum) and Raspberry (Rubus idaeus) from 12th, Tuberous Comfrey (Symphytum tuberosum) from 14th, Weld (Reseda luteola), Yellow Flag (Iris pseudacorus), Ground Elder (Aegopodium podagraria), Yellow Rattle (Rhinanthus minor), Silverweed (Potentilla anserina) and White Campion (Silene latifolia) all from 22nd, and Cocksfoot (Dactylis glomerata), Long-headed Poppy (Papaver dubium) and Stinging Nettle (Urtica dioica) from 24th.







Cryptogams (and more!), May 2022. A: Two NLRs on one leaf of Russian Comfrey (Symphytum × uplandicum), 12th: the rust Melampsorella symphyti (orange spots) and an aphid, probably an adult, winged example of Ovatomyzus boraginacearum. Photo Robert Mill. B, The Loch's first-ever record of a slime mould: False Puffball (Enteridium lycoperdon), 18 April, NLR. Photo Lee Brown (TEC). C, The lichens Cladonia chlorophaea (funnel-like structures) and Peltigera hymenina (at top, dark brown with white underneath), 12th. Photo Robert Mill.

# Cryptogams

Once again few cryptogams were recorded during May, partly because lichens and bryophytes are easier to record in winter when other plants have died back and partly because the main season for 'mushrooms', mildews and other pathogens has not yet begun. The rust *Melampsorella symphyti*, on leaves of Russian Comfrey on 12th, was a NLR, as was the Loch area's first record of any slime mould species. This was the False Puffball (*Enteridium lycoperdon*), photographed by Lee Brown of TEC on 18 April but only identified recently. The only noteworthy lichen records were of *Cladonia chlorophaea* and *Peltigera hymenina* growing side-by-side on the east side of the loch (12th).

#### **VILLAGE, BEACHES AND COASTAL PATH**



Common Toad (*Bufo bufo*) in a plant pot, 23 May. Photo Robert Mill.

A **Common Toad** was in a large plant pot in our back garden on 23rd. Lots of **Starlings** visited our bird table as well as the usual crows, magpies and gulls, and, a year after moving in to our newly built house, we have also finally begun attracting smaller birds such as **Blackbirds** and **Chaffinches** to our bird table and feeders.

Graham Sparshott, the official Fife bird recorder, made some impressive sightings during migration watches at East Braes (Kinghorn) in May, available at the Trektellen website (https://www.trektellen.org). They included a **Pomarine Skua** on 15th and a **Long-tailed Skua** on 29th, a **Roseate Tern** with

two Arctic Terns and 20 Common Terns on 20th, a Temminck's Stint and four Gadwall on 21st, a male Hen Harrier, a Wheatear and a Tree Pipit on 6th, a Barnacle Goose and a Whimbrel on 7th, 69 Manx Shearwaters on 14th with much smaller numbers on earlier and later dates, and 57 Common Scoter and one Velvet Scoter on 20th. Other notable records from there by him earlier this year were two Common Cranes flying NE on 12 March and a Grasshopper Warbler on 17 April. Paul Williams' May list for Seafield, totalling 47 species, also included some interesting records, such as two Grey Partridge, two Lesser Whitethroat and a Kestrel all on 3rd, and five lingering Purple Sandpipers on 7th. He also saw two Stock Doves there on 7th, a species with which I am familiar from my Edinburgh days but have not yet seen myself around Kinghorn.









A & B, Two different colour forms of the Brown-lipped Snail (*Cepaea nemoralis*) on a wall near Grangehill, 1 May. C, Yellow Figwort (*Scrophularia vernalis*), 1st. D, Spring Beauty (*Claytonia perfoliata*), 1st. Photos Robert Mill.

On a walk along the path over the golf course and past the caravans towards Grange Hill on 1st, I found two snails close together on a wall. One was banded dark chocolate-brown and looked like a typical **Brown-lipped Snail** (*Cepaea nemoralis*; its diagnostic brown lip at the front of the shell was just visible). The other was very much plainer, unmarked and a greenish-cream colour. My initial thoughts were that it might be a totally different species but I remembered that Brown-lipped Snail is one of the most variable snails we have in Britain, and on checking field guides I discovered that plain individuals do occur. Therefore, I concluded that I had found two very different colour forms of the same species, only a few centimetres apart on the same wall. On the same walk I found several plants of **Yellow Figwort** (*Scrophularia vernalis*) and even more of **Spring Beauty** (*Claytonia perfoliata*) on a steep, bare rubbly slope at the far end of the golf course track, above the caravan park.



Wall plants, Kinghorn village, 19 May 2022. A, Aubrieta (*Aubrieta deltoidea*). B, Yellow Corydalis (*Pseudofumaria lutea*). C, Fuchsia magellanica var. molinae (inset, flower). D, an as yet unidentified young Bamboo plant. Photos Robert Mill.

A walk down the hill to Townhead, Eastgate, Kirkcaldy Road and the harbour area on 19 May produced some interesting plant records. Aubrieta (Aubrieta deltoidea) was in full flower on a wall at Townhead, and Yellow Corydalis (Pseudofumaria lutea) was in profusion nearby. More unusual were a very pale pink hardy fuchsia, Fuchsia magellanica var. molinae, growing out of a wall (typical Fuchsia magellanica var. magellanica, with deep magenta and purple flowers, grows in various places such as near the bridge under the railway to the coastal path, and near Gallowhill Plantation by Kinghorn Loch), Dalmatian or Wall Bellflower (Campanula portenschlagiana) on a wall in Eastgate, and even a couple of as yet unidentified young bamboo plants growing on another wall on the Kirkcaldy Road! Cornsalad (Valerianella locusta) was found in several spots in the village, as well as at Pettycur. I also photographed Wallflower (Erysimum cheiri) on Seafield Tower on 17th and Buckshorn Plantain (Plantago coronopus) at Pettycur on 18th.



Shore life, May 2022. A, Wallflower (*Erysimum cheiri*), Seafield Tower, 17th. B, Buckshorn Plantain (*Plantago coronopus*), Pettycur, 18th. C, Young Mussels (*Mytilus edulis*), in huge numbers on rocks on the upper shore behind the sea defence wall, Seafield, 24th. D-F, Algae washed up on Seafield beach, 24th: D, Sea Lettuce (*Ulva lactuca*). E, the brown alga Dabberlocks (*Alaria esculenta*). F, a red alga known as 'Sea Beech' (*Delesseria sanguinea*). G, Spiralled Wrack (*Fucus spiralis*), attached to rocks, Seafield, upper shore. Photos Robert Mill.

Perhaps the most interesting record of marine life was of a Lesser Octopus (*Eledone cirrhosa*) washed up at Pettycur on 27th and photographed there by Cindy Blades, who then returned it to the sea. Her photo is on the Kinghorn Photos Facebook page. My own visits to Seafield on 17th and particularly 24th produced a variety of records, including the red algae *Delesseria sanguinea* ('Sea Beech') and *Phycodrys rubens* (sometimes called 'Sea Oak', although that name is also used for a brown alga, *Halidrys siliquosa*, underlining the need to use the proper scientific names if possible!), the brown algae *Alaria esculenta* ('Dabberlocks') and *Fucus spiralis* ('Spiralled Wrack') and the green alga *Ulva lactuca* ('Sea Lettuce') all at Seafield, and a Striped Venus (*Chamelea striatula*) shell on Seafield beach on 24th.

### References

EDWARDS, R.A. (1985). *Impact of a long-term caustic discharge from red mud disposal on a freshwater lake.* Ph.D. Thesis, University of Edinburgh.

MET OFFICE (1 June 2022). Warm May continues the theme of Spring.. <a href="https://www.metoffice.gov.uk/about-us/press-office/news/weather-and-climate/2022/warm-may-continues-the-theme-of-spring">https://www.metoffice.gov.uk/about-us/press-office/news/weather-and-climate/2022/warm-may-continues-the-theme-of-spring</a> accessed 11 June 2022.