

Meán Fómhair – Gairdín Coillearnaí na Scoile

Paddy Madden continues his series of SESE tips

November

Hands-on – the school woodland garden



*Mini wood –
Scoil Treasa,
Donore Avenue*

What is it?

An area in the school grounds devoted completely to a woodland edge habitat. Usually it's situated in a corner of the playground or a playing field.

Background information

A mini-wood should have four layers to increase biodiversity in the school grounds. The layers are as follows:

Ground layer

Made up of decomposing leaves and wood which encourage decomposers such as slugs, snails, worms, woodlice and millipedes. These in turn are eaten by centipedes and pygmy shrews. The latter are preyed on by birds, hedgehogs and badgers.

Flower layer

Made up of flowers such as bluebells and primroses which are opportunists. They bloom in the spring when no shade is cast by the leaves. Insects pollinate them at this time because they like light and warmth which will be missing later in the year when the leaves emerge.

Shrub layer

Made up of shrubs such as hazel and holly which produce food for birds and mammals in the autumn and winter and provide nesting sites for birds.

Tree layer

Made up of trees which dominate the other three layers. These trees provide food and nesting places for birds and mammals as well. They are linked to the ground layer by depositing their leaves there.

Why have a woodland garden in the school?

- ☀ It teaches children in a practical way about biodiversity ☀ It connects them to the changing seasons in a very visual way ☀ It enables them to 'read' a woodland edge or native hedgerow ☀ It is a peaceful retreat on the school grounds.

Planting

- ✂ About six months before planting place cardboard, black plastic or old carpet in designated area to kill weeds and grass.
- ✂ Plant bare-rooted whips (0.5-1.0 m high plants) c.2m apart in any month with an 'r' except April and September.
- ✂ Before planting make T shaped slits in the ground with a spade. See www.blackrockec.ie and click on 'Current Projects' and 'November'.
- ✂ Place a few thick layers of wet newspapers around the base of the whips to preserve moisture and suppress weeds. Cover this with bark mulch.
- ✂ Make sure to leave room for a serpentine path through the woodland about 2m wide.

Follow-on work

1. Make a log habitat at the back of the woodland using logs and black polythene. Place the polythene under the logs to prevent the spread of the honey fungus.
2. When damp, dappled shade develops after a couple of years, sow the flower layer. N.B. Use native bluebells rather than the Spanish ones.
3. After about five years thin the trees and shrubs to provide more room and light.
4. After about seven years many native trees can be coppiced viz. cut down to c. 30 cm from the ground. This prevents the trees from getting too big. They will grow again!

Suitable representative plants for three layers

Flower layer: *Bluebells, primroses, wood anemone, ferns, wild garlic.*
Shrub layer: *Holly, hawthorn, hazel, crab apple, honeysuckle.*
Tree layer: *Rowan, silver birch, alder, ash, oak.*



Hart's tongue fern

Pathway through woods at Lough Key Forest Park, Co. Roscommon, Ireland

Teaching Matters



Bluebell wood

Literacy/Litearthacht

- **Ground layer/Fódchiseal:** The bottom layer of a woodland edge or hedgerow comprised mostly of dead matter and detritivores and their predators. *An ciseal iochtarach d'imeall coillearnaí nó d'fhál sreach. Ábhar marbh den chuid is mó chomh maith le drámhóirí agus a gcreachadóirí a bhíonn sa chiseal seo.*
- **Flower layer/Bláthchiseal:** This layer is made up of spring flowers such as the bluebell and the primrose. *Bláthanna an earraigh cosúil leis an gcoinnle corra agus an sabhaircín a bhíonn sa chiseal seo.*
- **Shrub layer/Torscair:** This layer is made up of

shrubs such as holly and hazel. *Toir (cuileann agus coll, mar shampla) a bhíonn sa chiseal seo.*

- **Tree layer/Crannchiseal:** The canopy or tree layer of a woodland edge or hedgerow. *An ceannbhrat nó an crannchiseal d'imeall coillearnaí nó d'fhál sreach.*
- **Coppicing/Ag barrscoitheadh:** Cutting trees and shrubs such as hazel, holly, ash, alder and birch to about 30cm above ground to prevent them from getting too big. *Ag gearradh crann agus tor (coll, cuileann, fuinseog, fearnóg agus beith, mar shampla) go 30cm os coinn na talún chun cosc a chur orthu éirí ró-mhór.*

Buíochas do Marie Whelton (MIE) don aistriúchán.



Log seats



Woodland area, Ratoath SNS

Points to note

- Ash, aspen and willow have very invasive root systems so these three should be kept away from buildings.
- Trees that are not going to be coppiced should be planted about one and a half times their eventual heights away from buildings.
- The woodland edge should not face directly south; too much heat and light will infiltrate the trees to the detriment of the shade-loving plants.

Linking to the curriculum

- Make a hedgerow/woodland edge in a cardboard box to study the layers indoors. See www.blackrockec.ie/content/current-projects and click on 'October Projects' to see how to make a hedgerow in a box.
- Use the rotting logs to study mini-beasts and food chains.
- Use the flower layer to study pollination and opportunistic flowering of spring woodland flowers.
- Use the shrub layer to study birds in autumn.
- Collect and press leaves from the tree layer in summer.
- Study hibernation by placing a hibernaculum in the woodland. See www.blackrockec.ie/content/current-projects and click on 'October Projects' to see how to make one for hedgehogs.

Resources

Websites mentioned plus

- www.futureforests.net A good source for native trees and shrubs. They will send these to schools bare rooted.
- www.treecouncil.ie/ Lesson resources on trees.
- www.wildaboutgardens.org.uk/habitats/woodland-edge.aspx
- www.janehamelgardendesign.co.uk/creating-a-woodland-edge-habitat-in-your-garden/
- www.crann.ie
- www.projectforest.ie
- www.coillte.ie
- www.treecouncil.org.uk
- www.woodlandsofireland.ie
- www.millenniumforests.com
- Go Wild at School Chapter 1



PADDY MADDEN lectures on SESE in the Marino Institute of Education. He also gives short courses to whole staffs on school gardening. His book **Go Wild At School**, has recently been reprinted. Available for €18 from paddy.madden@mie.ie (Includes p&p).

