Decoding garden seed packets & catalogues

Part 2 of information on your seed packets.

Right now it's early morning, so it's still dark outside. The wind is wiping hard enough around the garden that I can hear it quite clearly indoors. It's cold and there are next to no leaves on the trees I can just about make out in the dark through the window. This time of year can be a bit miserable for a gardener like me who doesn't actively grow over winter. I am really looking forward to spring. REALLY!

January, however, is seed catalogue month, so I have some glorious time to spend all cosy indoors with a mug of tea, and my gardening porn (see yesterday's conversation about seed catalogues). Yesterday we spoke about hardiness zones, about knowing how to find out what seeds and plants would grow in your area. Today we are going to decode the information on your seed packets and catalogues so we can work out exactly what seeds and plants we might want to buy.

So let's dive in and have a look at some of my seeds and discuss a few of the terms. Some are very specific and have standards or legislation behind them (like organic or GM) and others are more open to interpretation like heirloom.

F1 or hybrid varieties

I see F1 hybrid written on quite a lot of the seeds I have bought over the years, especially on my courgettes but exactly what does that mean and is there an F2? Would F2 be better?

The easiest way to understand an F1 hybrid is to think of it like this. Imagine a plant breeder sees something really desirable in a plant, but also something they don't like, perhaps it grows really vigorously but the flowers aren't a great colour. In one of their other plants it doesn't grow as vigorously but the flowers are fantastic. They could take the best plant from each, and self-pollinate (in isolation from other plants) each year and, then each year, the seed is resown. Eventually, every time the seed is sown the same identical plants will appear. When they do, this is known as a 'pure line'.

If the breeder now takes the pure line of each of the two plants he originally selected and cross-pollinates the two by hand the result is known as an F1 hybrid. Plants are grown from seed produced and the result of this cross-pollination should be vigorous and have awesome flowers.

Genetically Modified (GM)

These are seeds which have been created by manipulating the genes of the plants in laboratories. GM seeds aren't licensed for sale to amateur gardeners in the EU.

Organic seed

This means the seeds have been grown from plants by certified organic means without pesticides, fertilisers or herbicides and must also be packaged without being treated with fungicides.

Annual, Biennial or Perennial

Annual plants grow, set seed, and die in a single season. Biennials take two seasons to set seed. Perennials, however, live year after year.





Determinate and Indeterminate

This is something I see a lot as I grow tomatoes and this relates specifically to them.

Determinate tomatoes (which you may also see labelled as patio or bush tomatoes) reach a certain height and then stop growing. The have multiple stems, hence being called bush, and can give high yeilds. I grow Sweet Million tomatoes which are this variety.



Indeterminate tomatoes keep growing and can get very tall, it's not uncommon for these plants to reach over 10 feet in height, so they require sturdy support or regular pruning to tame the vines. You will also hear these refered to as cordon tomatoes.

Heirloom and open pollinated

An heirloom variety is just an open pollinated variety which has a lineage that can be reliably traced back for a number of generations; it is a case of historical record rather than any difference in the genetics.

Open Pollinated or F1?

Theoretically, open-pollinated varieties are more genetically diverse so will thrive in a wider range of growing conditions and will, over the years, become more suited to growing in

your garden. Flavour in open-pollinated varieties can also be better because F1 varieties tend to be grown for commercial growers where traits like uniform ripening and long shelf life may be chosen over taste. Not always but it's something to consider.

F1 seeds, however, may be a better choice for disease resistance. For me, the conditions in Scotland are damp and cold so I see mildews and mosaic. F1 varieties allow me to choose plants which are resistant to this.

Sow and Grow

You will also find some useful info on the back of your seed packets about when to sow your seeds and if they should be started off indoors before planting out. This is a rough guide, it's good to think about this in terms of the weather in your area. For example, living in Scotland, I know we tend to be a bout a month behind other areas of the UK before I can get seeds germinating outdoors.

Sow indoors Sow outdoors Plant out Flowers 120-150cm (4-5')

J F M A M J J A S O N D 30cm (1')
Well drained soil

To Sow & Grow

Sow outdoors in a seed bed, 0.5cm (1/4") deep, directly into finely prepared soil which has already been watered. Seedlings appear in 21-35 days. Thin seedlings to 5cm (2") apart when large enough to handle, keep moist and weed free. Plant out to flowering position in autumn, allowing 25cm (10") between plants.

Or sow indoors 0.5cm (¼") deep, in a tray of compost. Water well and place in a cold frame, unheated greenhouse or on a warm kitchen windowsill. Keep moist. Transplant individually when large enough to handle to 8cm (3") pots. (Hold seedlings by a leaf, never by the stem.) Gradually accustom young plants to outside conditions before planting out 25cm (10") apart.

OK so you are now armed with some information on the various things you'll read, time to get the kettle on and go look at some seed catalogues.