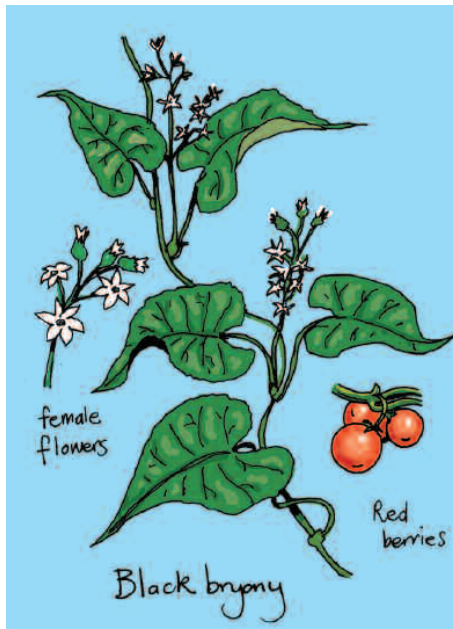


A lesson in morality from a fascinating hedge climber

In his book 'On growth and form' (1917) D'Arcy Wentworth Thompson produced what Peter Medawar hailed as "beyond comparison the finest work of literature in all the annals of science that have been recorded in the English tongue". Most of the work relates to animal structure, but some plant considerations are included which gives rise to reflections on strange growth habits in the vegetable world.

One thought occurs to me as I note the recent developments shown by black bryony, *Tamus communis*, in my local hedgerows. This fascinating little vine, a member of the yam family, belongs rightly to the tropics and is out of its normal range in Britain, having crossed the post-glacial land bridge from the east but being arrested by the Irish Channel. It throws out slender reddish stalks which plait together into a sturdy coil which hitches itself to more woody adjacent stems and lifts anticlockwise to a height of up to five metres, so that it comes to dominate over its neighbours and steal their sunlight and moisture. It serves as a reminder that unity is strength and co-operation is better than competition to permit development of an individual species.

Dioscorides pronounced the green parts of bryony "as tasty as asparagus" and many have agreed since his time, particularly in Cyprus and Algeria. He also remarked that its berries would remove freckles and other skin blemishes. People in the Isle of Wight believed that the berries, preserved by soaking in gin or brandy, were a cure for chilblains. Their power to relieve bruises led to their reputation in



France as "*l'herbe aux femmes battues*". The pulp from the scraped roots was applied to gouty and rheumatic lesions. Pounded roots were administered as a diuretic and purgative.

However, there are perils in taking bryony in any form. The sap blisters skin, and if tasted it burns the mouth and brings about vomiting and diarrhoea. Sheep and goats have eaten the herb without serious ill-effect, but horses have been fatally poisoned. In cattle the berries are irritant and narcotic.

Early humans reached Britain lured by a mild climate

Science for 22 April revealed some findings of a conference of palaeoanthropologists in Milwaukee, at which the participants discussed the early human settlement of Britain. Evidence derived from stone tools and bones of butchered animals shows that early man appeared in Britain more than 500,000 years ago.

Humans probably followed hippopotami, elephants, hyenas and other wild animals which sought the relatively balmy climate of that period. Thereafter, when cold spells intervened from time-to-time, human occupations ceased for several epochs. The was before the celebrated "Boxgrove Man" appeared, a member of the proto-Neanderthal species *Homo heidelbergensis*. One site examined in East Anglia has yielded tools that may be 700,000 years old.

These early humans carried a primitive stone tool kit for scraping and cutting food. Although they reached Britain early, they did not live there continuously. Particularly during periods of glaciation, signs of human occupation ceased. From 180,000 to 130,000 years ago mammoth and reindeer roamed the country, but then humans were apparently missing. With the thaw 130,000 years ago, hippos and elephants roamed the country but did not encounter humans, who reappeared 60,000 years ago as Neanderthals.

Modern humans disappeared from the scene during an ice age 25,000 to 17,000 years ago. Evidence of continuous human occupation has not been found until a mere 12,000 years ago.

Time to reflect and reconsider

"The whole question of improved armaments has been approached by the governments of the earth in a spirit of nervous and unreflecting haste, whereas the right way was lying plainly before them and had only to be pursued with calm determination. The learned vigils and labours of a certain class of inventors should have been rewarded with honourable liberality as justice demanded; and the bodies of the inventors should have been blown to pieces by means of their own perfected explosives and improved weapons with extreme publicity as the commonest prudence dictated. By this method the ardour of research in that direction would have been restrained without infringing the sacred privileges of science." — Joseph Conrad: 'The mirror of the sea' (1906)

And I quote . . .

Hedge row herb with a misleading name

Flourishing in the hedgerows in early summer is the ground ivy, *Glechoma hederacea*, which, despite its attribution both in English and in Latin, has not had the slightest relationship with the true ivy. A labiate, ground ivy goes by a vast number of local names, including alehoof, bird's eye, creeping Jenny, fat hen, hen-and-chickens, monkey flowers and wandering Jew.

It has thrived in Britain since the last ice age and is found throughout Europe and as far east as China and Japan. It was introduced into New England by the settlers there.

From Saxon times ground ivy was added to ale during brewing as a bitter principle, until it was ousted by hops at the end of the Middle Ages. It was reputed not only to sharpen the flavour but to improve the clarity of ales and beers, despite the criticism that it imparted an evil odour to the breath.

Its uses in folk medicine were diverse and it was prominent among domestic remedies.

In Tudor times baskets of ground ivy were paraded through the streets of London as a cure for coughs. It was also recommended to relieve ringing in the ears. A cooling beverage called "gill tea", made by infusing the leaves with boiling water and sweetening with sugar, was consumed for a variety of ills, particularly kidney disorders. Drinking an infusion was reputed to ward off the ravages of scurvy. A snuff made by drying the leaves and pounding them was inhaled to relieve headaches. Mixed with sugar and rosewater it was applied to soothe inflammation. The expressed juice of the stem and leaves was a remedy for bruising, applied as a poultice.

In eastern Europe cattle are reported to have been adversely affected by cropping ground ivy, but no such poisoning has occurred in Britain. Constituents of the plant include amino-acids, flavanoids, steroids, terpenoids and volatile oils. It has officially been approved as a flavouring agent for foods.