

OLD MAN'S BEARD

Clematis vitalba

Invasive Plant Information Note

What is it?

Old Man's Beard (*Clematis vitalba*) is an invasive deciduous perennial plant which is native to central and southern Europe. It was introduced to Ireland as an ornamental garden plant, often used to decorate trellises. Since then, Old Man's Beard has escaped into our natural environment and is particularly invasive in the southern half of Ireland. It can invade a range of habitats including agricultural land, long grass, fence lines, waste land, open spaces, roadsides, and forest edges. Please see link to its distribution across Ireland: <u>http://maps.biodiversityireland.ie/#/Home</u>.



Fig. 1: Old Man's Beard infestation (www.geograph.ie)

Why should we be worried about it?



Fig. 2: Vertical growth (www.kingcounty.gov)

Old Man's Beard spreads both vertically and horizontally. It can grow up to 7 times faster than ivy. Stems can grow several metres in a single season (See Fig. 2). The vines can form a dense, lightabsorbing canopy that suppresses all vegetation beneath it and can be so vigorous that the weight of the foliage and stems breaks the supporting trees (See Fig. 1 & Fig. 2). One plant is capable of blanketing an area of 180 sq. metres. Old Man's Beard is tolerant of cold, moderate shade, damp, wind, salt and most soil types. Damage from the species also enhances the colonisation of native habitats by other invasive plants. Access to sites can be restricted for humans and animals as a result of an Old Man's Beard infestation. Contact with Old Man's Beard can cause irritant dermatitis in humans. Old Man's Beard is also poisonous to grazing animals.



Fig. 3: Distinctive fluffy seed heads (www.woodlands.co.uk)



Fig. 4: Old Man's Beard flower cluster (www.gopixdatabase.com)

How do we recognise Old Man's Beard?

New stems of Old Man's Beard vary in colour from dark purple to green and have 6 longitudinal ribs (See Fig. 7). The stems are sensitive to contact and have the ability to become tightly twisted around suitable objects like trees, shrubs and fences. Stems can reach 15-20cm in diameter. Old Man's Beard can attain densities of over 7,000 stems/ha. The plant produces leaves in mid-spring. These vary from 50mm to 150mm in length. The leaves can be oval, heart-shaped or lance-shaped. There are usually five leaflets per leaf and these are arranged opposite each other on the stem (See Fig. 5). Old Man's Beard does not usually produce flowers until its third year. Flowering then occurs in late summer to early autumn. The flowers turn into wispy seed heads called achenes(See Fig. 3).







Fig. 5: Leaf consisting of 5 leaflets (www.gopixdatabase.com)

Fig. 6: Old Man's Beard flower head (www.terrain.net.nz)

Fig. 7: Cross section of stem (www.terrain.net.nz)

How does Old Man's Beard spread?

It can reproduce by both sexual (seed) and asexual (vegetative) means. An estimated 17,000 viable seeds are produced per 0.5 sq. metres in areas where Old Man's Beard is a canopy species. Seed dispersal is by wind, water, people and animals. The silky hairs on the seeds assist in their dispersal (See Fig. 3). Old Man's Beard often grows on roadsides, and the risk of seeds being transported on road vehicles from known infestations to new sites is high. Old Man's Beard can also spread vegetatively by stem fragmentation. Any stem that connects with the ground can form a new plant.

How to manage Old Man's Beard

Complete eradication of Old Man's Beard from a site may take a number of years. Integrated management using a combination of physical and chemical control measures is generally considered the most effective. Small seedlings can be readily pulled by hand. Larger stems can be cut and pulled from trees by hand once the foliage has dried. Please note that protective clothing should be worn as a result of the plant's potentially toxic nature. Seeds are small and may be spread unintentionally on shoes, clothes and machinery. As the plant is capable of regeneration by vegetative means, it is imperative that hanging vines do not touch the ground. Control will require continued monitoring and follow-up over a number of years to deal with re-growth and subsequent seedling germination.

For Further Information on Invasive Alien Species please visit:

- Invasive Species Ireland <u>http://invasivespeciesireland.com/</u>
- European Commission http://ec.europa.eu/environment/nature/invasivealien/index_en.htm