



Centre for  
Ecology & Hydrology

NATURAL ENVIRONMENT RESEARCH COUNCIL

Centre for Aquatic Plant Management

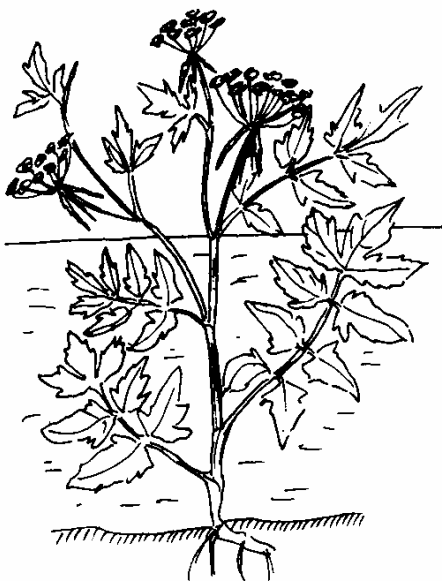
## Information Sheet 21: *Berula erecta* (Water Parsnip)

*Berula erecta*, the lesser or narrow-leaved Water-parsnip, is a perennial aquatic plant which grows in shallow, clear flowing water at the margins of ditches, ponds, lakes and rivers. It grows to heights of between 30cm and 1m and has umbelliferous white flower heads. It has grooved hollow stems. The leaves can be up to 30cm long and are a dull bluish green. There are pinnate segments of between 2cm and 5cm which vary in number between 5 to 19 pairs per leaf, the usual number is between 7 and 14 pairs per leaf. These leaflets have toothed edges. The characteristic features are a pale ring at the base of the leaf stalk and a smell of parsnip or carrot when crushed. It should not be confused with *Apium*

*nodiflorum* (Fool's Watercress) or *Rorippa nasturtium-aquaticum* (Watercress).

### Mechanical control

The growth of *Berula* is easily reduced by cutting or strimming. Mechanical control will only give short-term control (less than one season). The best time to cut is before flowering to reduce the spread of the plant by seed dispersal and regrowth. Quite often, the plant will regrow and produce flowers in the same season after it has been cut and it may be necessary to cut again later in the season.



*Berula erecta*

### Chemical control

This plant is controlled by glyphosate as Roundup Pro Biactive. The application should be made before the plant has flowered and any regrowth should be treated at the end of August. It is only moderately susceptible to dichlobenil (in slow flowing water). If dichlobenil is used it is preferable to stop the flow of water for at least one day to allow the herbicide to enter the plant.

Other members of the Apiaceae (*Apium* and *Rorippa*) are controlled by 2,4-D (suitable products: Atlas 2,4-D, Dormone or MSS 2,4-D Amine). In our opinion *Berula* should be controlled by this chemical. 2,4-D amine will control only broad-leaved weeds and it may be

preferable to use a product with a restricted range of target species in circumstances where the plant is growing mixed with reeds, rushes or other plants which are to be retained. This herbicide should be used on an experimental basis on short sections to test for efficacy before large areas of plant are treated, Neither the CAPM or the Manufacturer can be held responsible for a failure of 2,4-D amine to control this species.

### **Biological control**

None known.

### **Environmental control**

The plant will be controlled by shading (planting trees or opaque material) and by deepening the channel at the margins. These options may not be possible, but if an opportunity arises to incorporate the alterations into a future management plan combined with limited chemical or mechanical control then they should be adopted.



*Berula erecta* (Huds.) Coville

### **Best option**

Spray with glyphosate before flowering. Monitor regrowth and retreat in autumn if necessary.