

FOUR LGAs, ONE WEED Instructions for Arum Lily control using

Chlorsulfuron



To <u>watch a video on how to spray arum lilies</u> follow the links on the Arum Lily Blitz page at <u>www.natureconservation.org.au</u>

Instructions for Use of Chlorsulfuron for Arum Lily Control

(use **no more** than 1 gram/10 litres water: $1 g = \frac{1}{4}$ teaspoon)

- Pre-mix herbicide with 1 litre of water in a small bottle by capping and shaking vigorously until well mixed.
- Partially fill the spray unit with water and add the pre-mixed herbicide solution. Top up with water to the required volume.
- Next, add a wetting agent (usually 1-2 mL/litre, follow label directions). Close the unit and shake gently to mix. (It is most effective to use a wetting/penetrant agent such as Pulse, Sprinta or Brushwet/Spreadwet but if not add a generous dollop of good quality dishwashing detergent.) Using Envirodye is also recommended to colour the plants sprayed and enable you to see where you have been.
- Spray all arum lily leaves.
- The chemical is rainfast within 4 hours of spraying.
- After mixing in the spray unit, use spray within a maximum of 24 hrs to ensure the herbicide is still
 effective. If left to stand for an extended period re-agitation of the mix will be required.
- Do not apply to plants suffering stress.
- **Chlorsulfuron is a very slow acting chemical.** You may not notice the plants dying off until the end of the season. Chlorsulfuron should have a kill rate of 90% if applied correctly. Regrowth of surviving plants will occur 2 years after the initial spraying. Follow up spraying two years after the initial spray is essential to success.

Note:

- Always wear appropriate protective clothing when using herbicide (long pants and sleeves, boots and gloves). Avoid contact with eyes and skin. Do not inhale spray mist. Wash hands after use.
- Spray when at least 50-70% of flowers are present, this usually coincides with most of the leaves being unfurled.
- If treatment is not possible at this time due to wet conditions good control will still be possible up to late flowering (late Oct mid Nov) but will depend on the season.
- Do not spray into a waterway. Always make sure you are only spraying the plant.
- Do not apply under weather conditions that may cause spray to drift onto nearby plants.
- Take photos before spraying so you can see your success the following year.
- Please keep a record of the amount of time spent spraying and litres of spray mix used. This data
 will help us measure how much work is being done across the region and support future applications
 for funding.

Please tell others about Four LGAs, One Weed programme and let them know that free herbicide and technical assistance is available through this programme. Encouraging others to be involved will build on the work that you and many others in the region are doing.

Information about Chlorsulfuron:

- Chlorsulfuron is 100 times more active than traditional herbicides so very low rates are used in the field. It is a selective and translocated herbicide that is absorbed through the leaves and roots.
- At a soil pH of less than 7 chlorsulfuron is broken down quickly by hydrolysis and microbial degradation, persisting in the soil for a couple of weeks.
- In alkaline soils chlorsulfuron persists in the soil for longer, up to 12 months. It may affect seed germination in this time.
- The risk of surface and groundwater contamination is low as the herbicide will move less than 10 metres in the soil and also breaks down in water. It is not expected to cause ground water contamination problems due to its relatively rapid degradation in plants and soils, low use rates and low toxicity.
- It may kill off-target species so it is important to apply the herbicide carefully to the plant only.
- It has a low toxicity to mammals, birds, fish and invertebrates.
- Spraying plants with chlorsulfuron before flowering completely stops seed production. Spraying before berry expansion allows some seed to develop but reduces seed viability to less than 1%. Spraying plants when berries have fully expanded has no effect on seed production or viability.
- Some crops should not be planted for many months after chlorsulfuron application. This is because they are sensitive to extremely low levels of chlorsulfuron and not because of high levels of persistence of the herbicide in the soil.
- It takes approximately 24 hours for the herbicide to translocate to the tuber. Disturbance to the plant such as fire or slashing after that time won't impact on the kill rate.
- For weed resistance management chlorsulfuron is a Group B herbicide. For more information on resistance see product label.
- For relevant crop rotation recommendations see product label.
- Grazing advice: Avoid grazing treated areas within 24 hrs of application to optimise weed control. A nil
 withholding period is applicable for grazing chlorsulfuron treated areas (when used as directed on the
 label).
- Store in a closed container in a well-ventilated location, as cool as possible. Do not store for prolonged periods in direct sunlight.
- It is essential that the sprayer be properly cleaned after using chlorsulfuron to prevent injury to crops other than wheat, triticale, barley, oats or cereal rye. See product label for details.
- Information on Chlorsulfuron can be found on the Herbiguide website at http://www.herbiguide.com.au/InformationHerbicides.aspx

Find out more about the Four LGA, One Weed programme, funded by a State Natural Resources Management grant, at Leschenault Biosecurity Group's website, www.lbginc.org.au or ring the group on 0477 409 967.

The label and material safety data sheet for this chemical can be found at: www.deltaag.com.au or www.lbginc.org.au

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