The agricultural impact of African lovegrass in the Limestone Coast is significant.

The hardy grass produces unpalatable tussocks that displace productive plants in pastures.

The Limestone Coast Landscape Board seeks to reduce the impact and spread of this invasive grass to the regions agricultural industry and environment.

Why is it a problem?

African lovegrass:

- Invades dryland pasture, native vegetation and roadsides.
- Is a tough perennial grass with low nutrition value and palatability.
- Produces large amounts of seed and has the potential to form a monoculture where it is present.
- Presents a significant fire hazard as the rank tussocks are highly combustible.
- Is easily spread.
- Displaces productive plants in pastures.
- Once established in an area, removal of the summer growing, perennial grass can be expensive.

Reducing seed spread

The best form of weed control is prevention and eliminating seed spread is crucial.

African lovegrass is easily spread by stock, wind or when the seed heads are caught in the undercarriage of vehicles. It is also known to be spread by slashing.

If the infestation is not discovered until it is seeding, do not drive through the area except to treat the weed. Strict vehicle hygiene protocols are required to reduce seed spread.

If you have found African lovegrass in a paddock that stock have been grazing, contain stock for at least 10 days to empty out before moving them to a different paddock.



Timing of control

All control measures should be carried out before seed heads develop. Infestations should be treated as early as possible to prevent large scale establishment.

Planning for integrated control

African lovegrass is hardy and persistent. It will not disappear after one treatment. An integrated control program needs to be developed and must:

- Assess each specific site for the level of infestation and site characteristics.
- Research and understand the weed treatments that have previously been applied – control methods need to be rotated from one year to the next. This will help to avoid the build up of resistance to control methods.
- Determine the goal for control for that site.

For dense infestations, an annual plan integrating a number of control methods may assist in an overall program:

- Mid spring to early summer defoliate using a variety of options including fire, slashing or heavy grazing in preparation for summer spraying.
- Summer heavily graze (before seed heads develop) to restrict the mass prior to treating with herbicide.
 Applying nitrogen fertiliser can improve palatability.
- Summer to autumn spray with herbicide when the plant is actively growing.
- Autumn to winter improve soils and renovate pastures to outcompete African lovegrass with desirable species.



Control methods

Mechanical control

Mechanical control includes burning, slashing, grazing and cultivation.

If slashing an infestation, do not slash when the plant is seeding as this will spread the seed.

If grubbing out root crowns, vigilant follow-up and monitoring is required as root fragments may be left behind and will likely keep growing.

Renovating soil and pasture

Soil renovation, pasture establishment and maintenance to support growth of competitive species is proven to be effective at suppressing African lovegrass. This method relies less on chemical and mechanical control.

Renovating, improving or enhanced grazing management of pastures assists the conservation of soil and enables desirable species to establish.

Chemical Control

The methods of chemical control includes spot spraying, boom spraying, granule spreading and hand line. Choice of delivery method will depend on;

- the chemical used,
- accessibility to the infestation and
- off-target risks.

Any use of chemical must be rotated to avoid resistance. Applying herbicide in dry winters or droughts can deliver poor control results.

Two herbicides registered for control of African lovegrass are glyphosate and flupropanate.

- Glyphosate is a non-selective herbicide that is absorbed through a plant leaves. It is most effective if applied in early summer after defoliation and fresh green growth has occurred. Surfactant is recommended to penetrate the grass for better herbicide uptake.
- 2. Flupropanate is a selective, residual herbicide that is absorbed via the plant roots. Flupropanate:
 - May take up to 3 months before signs of treatments are visible, and up to 18 months before the plant is dead.
 - Can be residual for 1 2 years.
 - Has withholding periods before the area can be grazed or cut for stock food: 14 days if spot sprayed and 4 months if boom sprayed.
 - Can be applied just before the active growing season (late spring) to just before frosts in autumn.

Important: Always read the product label before undertaking herbicide application.

Visit the Biosecurity SA website for further information on best practice methods and chemical applications for controlling declared weeds.

Landholder responsibility under the Landscape South Australia Act

African lovegrass is a declared weed under the *Landscape South Australia Act 2019 (the Act)*. Under the Act landholders have a legal responsibility to control declared plants on their land.

Declared weeds have restrictions on their movement, sale, notification and control.

Implementing control on roadsides

The Limestone Coast Landscape Board are responsible for controlling declared pest plants and animals on roadsides.

Adjoining landholders may prefer to undertake the roadside treatment themselves. In doing so they must obtain appropriate authorisation from relevant authorities and comply with other regulatory requirements prior to commencing works.

When working on roadsides landholders must take all reasonable steps to ensure native vegetation is protected.

Landscape Officers

Landscape Officers for the Limestone Coast Landscape Board are located across the region and can help landholders control declared weeds by providing:

- Support for weed identification and mapping
- Advice such as best practice control
- Assistance with coordinating large scale weed control on private property with neighbours.

What does African lovegrass look like?

- African lovegrass is a robust perennial tussock grass which can grow to 1.3 m high.
- The leaves range from bright green to bluegreen, are narrow and up to 35 cm long.
- Seed heads are initially purple-green, but turn straw-coloured when ripe.
- Seeds are straw-coloured to brown and are very small, less than 1 mm.
- The roots are fibrous and usually only grow to about 50 cm deep into the soil.

Other common names: weeping lovegrass, boer lovegrass, curved lovegrass, catalina lovegrass.

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