



Declared Plant Policy

This policy relates to natural resources management under section 9(1)(d) of the Landscape South Australia Act 2019 (the Act), enabling co-ordinated implementation and promotion of sound management programs and practices for the use, development or protection of natural resources of the State. Specifically, this policy provides guidance on the use and management of natural resources relating to the prevention or control of impacts caused by pest species of plants that may have an adverse effect on the environment, primary production or the community, as per object s7(1)(f) of the Act.

Bathurst burr (*Xanthium spinosum*)

Bathurst burr is a spiny annual with hooked burrs, related to the Noogoora burr complex. Bathurst burr is widespread in South Australia and can be very abundant in seasons with favourable conditions.

Management Plan for Bathurst burr

Outcomes

- Minimise losses to the wool industry due to hardhead burr contamination.

Objectives

- Decrease the effect of Bathurst burr on the wool industry.
- Prevent further spread of Bathurst burr to uninfested areas with suitable habitat.
- Existing infestations contained.
- High priority infestations eradicated as detected in accordance with regional management plans.

Best Practice Implementation

- Ensure Bathurst burr infestations, determined as regional priorities by the regional landscape boards, are controlled.

Regional Implementation

Refer to regional management plans for further details.

Region	Actions
Alinytjara Wilurara	Monitor
Eyre Peninsula	Protect sites
Green Adelaide	Contain spread
Hills and Fleurieu	Contain spread
Kangaroo Island	Destroy Infestations
Limestone Coast	Contain spread (control in whole region)
Murraylands and Riverland	Manage sites
Northern and Yorke	Manage weed
South Australian Arid Lands	Manage sites (no enforced control, landholders encouraged to manage)

Bathurst burr policy

Declaration

To implement this policy, Bathurst burr is declared under the *Landscape South Australia Act 2019* throughout the whole of the State of South Australia. Its movement or transport on a public road, by itself or as a contaminant, or sale by itself or as a contaminant are prohibited. Regional landscape boards and Green Adelaide may require land owners to control African lovegrass plants growing on their land. Landscape boards and Green Adelaide are required to control plants on road reserves in their regions, and may recover costs from the adjoining land owners.

Bathurst burr is declared in category 2 under the Act for the purpose of setting maximum penalties and for other purposes. Any permit to allow its sale or road transport can only be issued by the Chief Executive of the Department for Environment and Water (DEW) or their delegate pursuant to section 197.

Under the *Landscape South Australia (General) Regulations 2020*, Regulation 27 specifies the conditions under which a person is exempt from the operation of section 186 and may transport wool, grain or other produce or goods carrying Bathurst burr on public roads. Regulation 28 specifies conditions under which a person is exempt from the operation of section 188(2) and may sell wool, grain or other produce or goods carrying Bathurst burr. Note that certain produce or goods may be excluded from these general movement and sale exemptions by Gazettal Notice of the Chief Executive of DEW.

The following sections of the Act apply to Bathurst burr throughout each of the regions noted below:

Sections of Act	Region									
	AW	EP	GA	HF	KI	LC	MIR	NY	SAAL	
186(1) Prohibiting entry to area										
186(2) Prohibiting movement on public roads	X	X	X	X	X	X	X	X	X	
188(1) Prohibiting sale of the plant	X	X	X	X	X	X	X	X	X	
188(2) Prohibiting sale of contaminated goods	X	X	X	X	X	X	X	X	X	
190 Requiring notification of presence										
192(1) Land owners to destroy the plant on their properties										
192(2) Land owners to control the plant on their properties	X	X	X	X	X	X	X	X	X	
194 Recovery of control costs on adjoining road reserves	X	X	X	X	X	X	X	X	X	

Review

This policy is to be reviewed by 2025 or in the event of a change in a regional management plan for Bathurst burr. Success will be measured by the number of new infestations recorded by regional landscape boards.

Weed Risk

Invasiveness

Bathurst burr is dispersed by burrs attached to stock, and also by floodwaters. To establish it requires a year with summer rains to provide adequate water to break seed dormancy, but can persist in dryland areas, away from waterways.

Impacts

Bathurst burr impacts on grazing, mainly in the southern perennial pastures but also in the rotational pasture/arable land use. Its burrs are a major contaminant of fleeces in some years, especially when summer rainfall has been high. However, it is unlikely to become a major weed in the higher rainfall areas of South Australia as it is a poor competitor, establishing mainly in bare disturbed sites, after floods or on fallows. It does not tolerate dense competition from other weeds or dense pasture. It has been widespread in the more marginal pasture areas for over a century, and incursions into areas such as the lower Limestone Coast have been minor. It is a weed of summer crops in the eastern States.

Potential distribution

Potential distribution of Bathurst burr extends across the agricultural zone from western Eyre Peninsula to the South East, and also in suitable microhabitats in the Alinytjara Wilurara and SA Arid Lands regions. The main sites open to infestation are around dams, along drains and the flood-out areas associated with creeks and rivers.

Feasibility of Containment

Control costs

Bathurst burr is highly visible when growing, and control in pasture is readily achieved by commonly used selective herbicides, or spot spraying small infestations with nonselective herbicides. Landowners are generally eager to control it as it is a recognisable, spiny weed.

Persistence

The registered chemical control methods are highly effective on growing plants, but Bathurst burr will survive as a seed bank for several years.

Current distribution

The distribution of Bathurst burr is disjunct due to its habitat requirements, but extends from eastern Eyre Peninsula through the mid North, Yorke Peninsula, Riverland, Limestone Coast and parts of the mallee. It has been recorded on Kangaroo Island.

State Level Risk Assessment

Assessment using the Biosecurity SA Weed Risk Management System gave the following comparative weed risk and feasibility of containment scores by land use:

Land use	Weed Risk	Feasibility of control	Response at State Level
Crop-pasture rotation	medium 56	high 23	protect sites
Grazing – southern	high 112	high 20	contain spread
Irrigated pastures	high 172	very high 12	destroy infestations
Grazing - rangeland	low 28	very high 9	monitor

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Vegetables	low 20	very high 1	monitor
Perennial horticulture	low 34	high 16	monitor

Considerations

The *Thistle and Burr Act 1862* was proclaimed primarily to prevent further spread of Bathurst burr, which was already well established in agricultural districts that had been settled at that time. One and a half centuries years later it is a less conspicuous part of the weed flora, and may have already reached most sites where it can become a major weed.

Risk assessment indicates destruction of Bathurst burr in irrigated pastures, protecting sites in rotational farming, and containment in southern grazing lands. In practice, these actions are implemented according to the level of infestation in each region. In Northern and Yorke the weed is managed as it has spread to its limits in this region. The Murraylands and Riverland manages infested sites with priority given to pasture and cropland and the Riverland subregion where irrigated pastures occur. The Hills and Fleurieu region contains infestation and targets them for destruction. In the Limestone Coast spread is controlled by control over the whole region. Control is not enforced in the Alinytjara Wilurara and SA Arid Lands regions. Because Bathurst burr is very localised on Kangaroo Island, it is intended to destroy all infestations found there.

Synonymy

Xanthium spinosum L., Sp. Pl. 2: 987 (1753)

Nomenclatural synonym: *Acanthoxanthium spinosum* (L.) Fourr., Ann. Soc. Linn. Lyon ser. 2 17: 110 (1869)

Taxonomic synonym: *Xanthium catharticum* Kunth, Nov. Gen. Sp. 4: 216 (1818)

Other common names include burrweed, cat's eggs, common cockleburr, daggerweed, prickly burrweed, spiny burrweed, spiny clotburr, spiny cockleburr, sheep's burr, thorny burrweed.

Hon David Speirs MP
Minister for Environment and Water

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