



Frequently asked questions – Lumpy skin disease

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1. What is lumpy skin disease?

Lumpy skin disease (LSD) is a viral disease which infects all breeds of cattle and buffalo. It has never occurred in Australia but is an emerging threat as it continues to spread through Asia. The disease is primarily spread by biting insects and causes fever, depression and lumps on the skin in affected animals.

2. Is LSD in Australia?

No, LSD is not in Australia. There has never been an outbreak of LSD in Australia.

3. Where is LSD found?

LSD first occurred in Africa. From the late 1980s it was detected in parts of the Middle East, from 2012 in Europe, and from 2019 in mainland South-East Asia, gradually moving east. In March 2022, LSD was detected in Singapore and Indonesia.

4. Which animals does LSD affect?

LSD affects cattle and water buffalo. LSD does not affect sheep, goats, pigs or horses.

5. Why is LSD such a serious problem?

LSD is a significant biosecurity threat to the Australian cattle and buffalo industries. LSD causes production losses through severe loss of body condition, damaged hides, reduced reproductive rates, and can be fatal.

If introduced to Australia, LSD would also have a substantial impact on international and domestic agricultural markets. An incursion and outbreak may result in an immediate loss of a number of international export markets.

LSD also has significant animal welfare implications.

6. What are the signs of LSD?

Affected cattle and buffalo develop a fever of up to 41.5°C and may also have watery eyes, nasal discharge and excess salivation (drooling).

Within 1–2 days, raised nodules up to 50mm in diameter commonly appear around the head, neck, limbs and genitals and may cover the entire body.

Scabs form on these nodules and may fall off, leaving large holes in the hide that can become infected.

The brisket, genitals and legs may appear swollen.

Cattle may look lame or be very reluctant to move.

Note: *Bos indicus* (northern) breeds may be less severely affected and may only show subtle signs which can be difficult to identify.

7. How does LSD spread?

The two main methods of spread of LSD are through movement of infected animals, and via infected biting arthropods (such as ticks, biting flies and mosquitoes). Disease transmission by direct contact between animals can also occur.

Movement of infected cattle and hides, contaminated vehicles, feed and water, re-use of equipment such as hypodermic needles, and windborne spread of biting arthropods will all be important methods of spread. Infected bulls can excrete the virus in semen and experimental transmission has been demonstrated.

All livestock owners should have good biosecurity measures in place on their property, including accurate records of livestock movement. To access farm biosecurity advice and resources visit farmbiosecurity.com.au.

8. How could LSD be introduced to Australia/Western Australia?

There are several different pathways for the entry of LSD into Australia.

Entry into northern Australia may occur via insects carried across from Indonesia via strong winds during monsoonal weather. Long distance spread of biting insects, such as *Culicoides*, (a type of biting midge) from Indonesia to Australia has been documented.

Other entry pathways into Australia, include insects entering on returning vessels. Strict insect control protocols are implemented on returning vessels to ensure effective disinfestation and reduce the likelihood of this entry pathway.

The Department of Agriculture, Fisheries and Forestry has heightened border controls to reduce the likelihood of introduction of any exotic disease via returning vessels and travellers returning from high-risk destinations.

9. What should you do if you suspect LSD?

Early disease detection is essential for successful disease control and eradication.

Livestock producers must be alert for signs of the disease in their animals. The sooner LSD is recognised and reported, the sooner its spread can be controlled.

If you see any cattle or buffalo with signs suggestive of LSD, whether recent or recovering, call:

- your veterinarian, or
- your [DPIRD veterinarian](#), or
- the Emergency Animal Disease Watch hotline on 1800 675 888.

Minimising the spread of the disease through early detection and reporting will reduce the economic and social costs of an outbreak to livestock producers, livestock and regional industries and the national economy.

10. Does LSD affect humans?

LSD does not infect humans. The virus only infects cattle (all breeds) and water buffalo. It does not infect sheep, goats, pigs or horses.

11. How to protect your livestock from LSD?

Livestock producers must be alert for signs of disease in their animals. If animals are showing signs of disease that are consistent with FMD, this needs to be reported as a matter of urgency to the **Emergency Animal Disease Watch Hotline** on **1800 675 888** or to your local veterinarian.

To reduce the risk of any emergency animal disease occurring in your animals:

- isolate new animals for 7–10 days
- keep fences secure to ensure stray animals do not enter
- have an allocated area away from livestock where contractors/farm visitors park vehicles

Protect your industry by reporting signs of disease early. If you see any signs of LSD:

- isolate the affected animal(s)
- do not move any livestock off your property
- call your private veterinarian, **DPIRD veterinarian**, or the Emergency Animal Disease hotline on **1800 675 888**.

Good biosecurity practices and early detection are essential to prepare for and reduce the potential impact of these diseases. Producers are urged to exercise vigilance on farm, including being aware of the symptoms of LSD and reviewing on-farm biosecurity plans.

- DPIRD provides useful biosecurity checklists for livestock producers. See the webpages: **Farm biosecurity checklist for sheep producers**, **Keep pigs healthy - follow the biosecurity checklist**.
- The Farm biosecurity website has a range of biosecurity planning resources to help you prepare an on-farm biosecurity plan as well as preparing your business to survive an emergency animal disease outbreak.

Western Australia has a mandatory livestock ownership, identification, and movement system. There is also a legal responsibility to report signs consistent with FMD and other reportable diseases.

If an outbreak occurred, traceability of infected or exposed livestock would be critical for Australia to control and eradicate the disease so DPIRD and industry knows where animals are and who is responsible for them. Producers should ensure their property and livestock registration details are up to date, as this assists with effective and rapid communication in a biosecurity emergency response where quick action is required.

Livestock owners should visit our [Livestock ownership, identification and movement in Western Australia](#) webpage to learn more about how to meet these requirements.

12. What is being done to protect Australia from LSD?

The Department of Agriculture, Fisheries and Forestry has strict import conditions on products of animal origin and high-risk items entering Australia through traveller, mail, and cargo pathways. The disease status of our trading partners is regularly monitored to ensure the risk of disease entry is managed.

The Department of Primary Industries and Regional Development (DPIRD) is working with livestock industries and the public to raise awareness of LSD, particularly in northern Western Australia, to increase the likelihood of early disease detection which is essential to give Australia the greatest chance of eradicating the disease if an incursion into Australia occurs.

DPIRD and WA industry have established a preparedness task group which is looking at response arrangements and planning, traceability and supply chain continuity to minimise the impact of disease if an incursion occurs.

Australia has detailed LSD response plans in place. The national [Australian Veterinary Emergency Plan \(AUSVETPLAN\)](#) contains Government's and Industry's agreed response strategies to an incident. These plans are continuously reviewed to ensure Australia is prepared to effectively respond to an emergency animal disease incursion.

13. What can I do to prevent LSD and other diseases entering Western Australia?

West Australians benefit from Australia's and Western Australia's well-established border and post-border biosecurity systems.

Individual Australians need to play their part as well – biosecurity is everyone's responsibility.

If you are planning an overseas trip, make sure you know what you are **not** allowed to bring back into Australia and declare at the airport customs anything you are in doubt about.

Travellers who have had direct contact with livestock or farms in infected countries need to declare this when arriving in Australia and ensure all footwear, clothing and equipment is free of mud and animal manure. They should not have direct contact with livestock for 7 days after arrival.

Maintaining good biosecurity practices when you visit farms ANYWHERE also reduces the chances of you bringing something unwanted back to WA. Cleaning boots and equipment used on animals before returning and changing your clothes before coming in contact with your animals is a useful habit to get into.

14. What would happen if an LSD outbreak occurred in Australia?

Australian commonwealth and state and territory governments and peak industry bodies are signatories to the [national Emergency Animal Disease Response Agreement \(EADRA\)](#). This is a contractual arrangement between Australia's governments and industry groups to collectively reduce the risk of disease incursions and manage a response if an outbreak occurs.

The EADRA commits all signatories, including industry, to preparedness and early detection activities, including good on-property biosecurity, reporting any suspicion of disease, and maintaining good traceability. All parties that are signatories to the EADRA commit to the

participation in an EAD response and to contribute to funding the eligible costs of responding to an EAD by which they are affected.

Australia's Veterinary Emergency Plan (AUSVETPLAN) contains the nationally agreed approach for the response to an outbreak of LSD in Australia. Government and industry signatories to the EADRA have agreed to a detailed contingency plan for responding to the outbreak of any of the major exotic animal diseases, including LSD. For full details see [AUSVETPLAN - Disease Strategies](#).

The national objective is to eradicate an incursion of LSD as quickly as possible.

This nationally agreed policy of eradication would involve the depopulation of infected livestock, in addition to the use of other response tools, such as the control of movement of livestock.

Following a detection of LSD, movement controls to reduce the likelihood of spread of disease would be immediately implemented in WA and may be applied to cattle, animal products and by products, vehicles and equipment. Vaccination will be considered as a component of the response, noting that Australian governments and industry are currently undertaking activity to identify and obtain regulatory approval of an appropriate vaccine, to have available if an incursion occurs in Australia. Vector control will also likely be an important consideration of the response

Further information on national response frameworks can be found at [Animal Health Australia](#) and National pest & disease outbreaks - <https://www.outbreak.gov.au/how-we-respond-to-outbreaks>

15. Are there vaccines available for LSD?

While there are vaccines available overseas, there are no vaccines currently available for use in Australia. Australian governments and industry are currently undertaking activity to identify and obtain regulatory approval of an appropriate vaccine to have available if an incursion occurs.

It is not intended to vaccinate animals before an LSD incursion. If Australia vaccinated animals against LSD prior to an incursion, then Australia would lose its LSD disease-free status, in accordance with World Organisation for Animal Health standards, which would negatively affect international export market access.

16. What role does traceability play during a potential LSD incursion?

In the event of an emergency animal disease incursion, for disease tracing and response planning purposes, it is essential DPIRD knows where susceptible animals are, their prior movements as well as the party who is responsible for them. Producers should ensure their livestock ownership registration details and NLIS livestock transfers are current.

17. Will I receive compensation if my livestock get LSD?

Compensation arrangements are in place to ensure that people who report suspicion of disease early are not financially disadvantaged.

AUSVETPLAN and state legislation provides details on compensation arrangements while Australia's Emergency Animal Disease Response Agreement (EADRA) documents nationally agreed arrangements for the cost sharing of compensation paid to affected livestock enterprises.

For more information see: https://www.animalhealthaustralia.com.au/wp-content/uploads/dlm_uploads/Fact-sheet_Compensation-and-valuation-in-an-EAD-response.pdf

18. Where can I get more information?

DPIRD webpage: <https://www.agric.wa.gov.au/lumpy-skin-disease>: prevention and preparedness

Department of Agriculture, Fisheries and Forestry : <https://www.agriculture.gov.au/biosecurity-trade/pests-diseases-weeds/animal/lumpy-skin-disease#what-will-happen-if-the-disease-is-reported-on-my-property>

QLD LSD and FMD engagement hub: <https://daf.engagementhub.com.au/animal-disease-preparedness>