



Glovebox

Guide

Biosecurity, Emergency Animal Diseases
and preparing livestock for transport.



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Section 1

Responsibilities & Contacts



About this guide

LBRCA and MINTRAC have collaborated to develop this guide for LBRCA members. This guide will give livestock transporters the knowledge and confidence to recognise the signs and behaviours in livestock that could indicate an animal may have an Emergency Animal Disease (EAD). The livestock transport industry plays an important role in the surveillance, early detection, and reporting of these diseases.

The guide will refresh your knowledge of the requirements livestock transporters must meet to adhere to the *Australian Animal Welfare Standards & Guidelines for the Land Transport of Livestock* (the 'Standards'); In NSW, the *Prevention of Cruelty to Animals (Land Transport of Livestock) Standards 2013 No 2* is a mandatory standard. These guidelines are in place to ensure that the welfare of animals is met at all stages of the transport system.

Please refer to MLA 'Is the animal fit to load?' and APL 'Is it fit for the intended journey?' guides for further information and images.



Emergency contacts

LivestockASSIST

1800 425 782

A 24-hour national hotline to coordinate emergency responses to incidents involving heavy vehicles carrying livestock. The hotline is free for all livestock transporters or anyone else at the scene of an accident.

Emergency Animal Disease

Watch Hotline: 1800 675 888

This toll-free telephone number connects the callers to the state or territory government officer. It is monitored 24 hours a day, 7 days a week. Anyone with concerns about the potential for an EAD incident should call this number for immediate advice and assistance.

Department of Primary Industry (DPI) contacts

If you are concerned about the welfare of any animal, contact a local veterinarian or the primary industry department in your state/territory.

NSW:.....**1800 680 244**

SA:.....**1800 255 556**

WA:.....**08 9368 3333**

TAS:.....**1300 368 550**

NT:.....**1300 720 386**

QLD:.....**13 25 23**

ACT:.....**13 22 81**

VIC:.....**13 61 86**

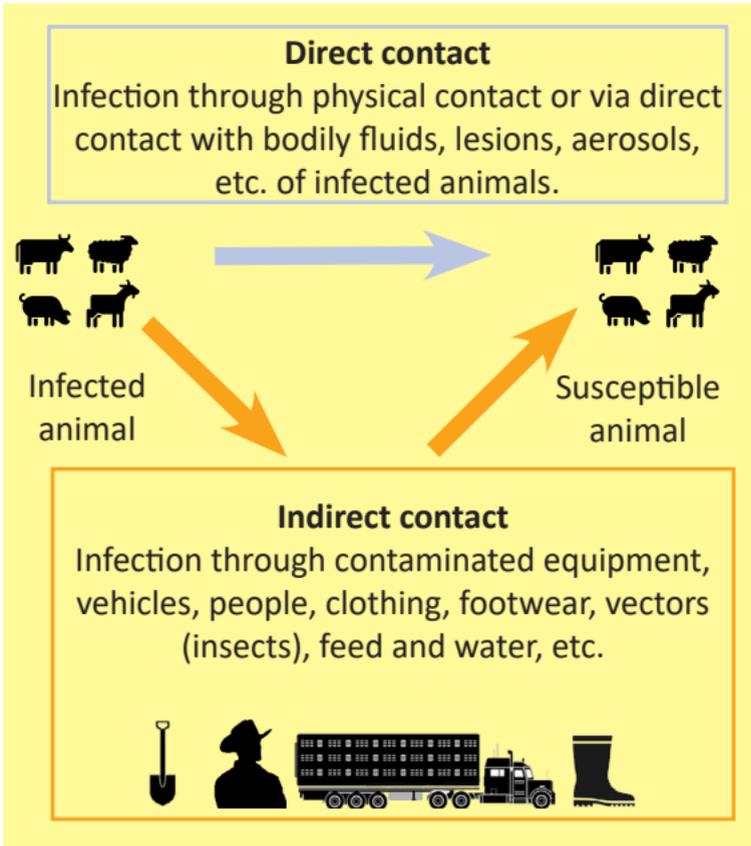
Chain of responsibility

The chain of responsibility for livestock welfare in the transport process is:

Responsibility	Who
Assembling and preparation of animals including the selection of livestock as 'fit for the intended journey', feed and water provisions, and holding periods before loading.	CONSIGNOR
Loading and transport of livestock including final inspection (during loading) as 'fit for the intended journey', loading density, additional inspections and spelling periods during the journey, and unloading.	TRANSPORTER
After unloading.	RECEIVER

Transporters are responsible for the animals when they are loading, during the journey, and when they are unloading.

Biosecurity measures



Biosecurity is a set of measures used to reduce the introduction and spread of disease-causing organisms and pests, thereby minimising the impact of disease.

The process of transporting animals as well as the standard of hygiene in transport plays a major role in maintaining good biosecurity. The movement of livestock and their by-products (faeces and urine) can facilitate the spread of disease around the country. During transportation, livestock can be at risk of contracting or spreading infectious diseases by direct or indirect contact.

A chain of strict biosecurity measures is recommended to maintain the health and well-being of livestock at the place of loading, unloading, and during the journey.

Biosecurity best practice

Livestock transporters should implement routine biosecurity measures at all times:

- ✓ maintain good personal hygiene
- ✓ routinely clean clothing and footwear
- ✓ have PPE available
- ✓ make sure disposable PPE such as boot covers, coveralls, and gloves are disposed of appropriately
- ✓ remain vigilant when working around livestock
- ✓ do not transport any animal showing any signs of disease
- ✓ be vaccinated for Q-fever
- ✓ follow the appropriate truck wash clean down procedures
- ✓ keep all equipment, sorting-boards, paddles, etc. cleaned and disinfected
- ✓ keep transport units clean, dispose of organic matter appropriately
- ✓ follow any specific biosecurity protocols at each premise or property.

Livestock can pass diseases to you. You should always practice good personal hygiene. Keep your hands clean and always remember to wash your hands (or use hand sanitiser) before eating and drinking.



Section 2

Emergency Animal Diseases



Emergency animal diseases

An Emergency Animal Disease (EAD) is a disease that affects animals and an outbreak would be of national significance. This is due to the potential devastating effects on:

- animal health
- human health
- the environment
- the economy.

Zoonotic diseases are a group of infectious diseases of animals that can be transmitted to humans. Some zoonotic diseases are **notifiable**. A notifiable disease must be reported by law to government authorities.

Zoonotic diseases can be deadly to humans. You should have no contact with the animal if a zoonotic disease is suspected. Zoonotic diseases include Anthrax, Rabies, Rift Valley Fever, Hendra Virus, Vesicular Stomatitis, Q-Fever and Scabby Mouth.

Transporters are at the front line of the detection of EADs. Early intervention is vital in the response to an EAD outbreak. If you see any of the following signs and/or behaviours, report them. Individuals or companies will not be penalised for calling the **Emergency Animal Disease Watch Hotline 1800 675 888** in the event of a false alarm.

Livestock Standstill - impact on transporters

A Livestock Standstill will be ordered if an emergency animal disease, such as Foot and Mouth Disease (FMD), is diagnosed or strongly suspected anywhere in Australia.

A Livestock Standstill is the restriction on the movement of livestock. This is to help limit the spread of disease through the movement of infected animals by vehicles and through the dispersal of animals from saleyards.

There will be widespread media coverage plus the Government will immediately inform key industry groups, including livestock transporters, who will share the responsibility to communicate the information to all relevant people by the fastest and most effective means.

For example, in an FMD outbreak a Livestock Standstill will initially be imposed for 72 hours to all cloven-hooved animals.

What rules apply?



- **NO** new livestock transport journeys are allowed.
- **NO** livestock can cross a state or territory border without a permit issued by the jurisdiction receiving the livestock.
- Livestock **must not** be moved to, from or between other properties (except under permit) apart from those completing current journeys within the initial four hour period.
- Livestock may be moved within their farm to undertake normal husbandry practices.
- There are severe penalties and potential imprisonment for non-compliance with a Livestock Standstill Order.

What if you're transporting stock when a Livestock Standstill is initiated?

Livestock in transit when a standstill commences may continue their journey, provided that the journey began and will end within the same state, can be completed within four hours of the declaration of the standstill, and the movement is:

- from farm to farm or feedlot or
- to an abattoir, if the abattoir agrees
- returning to where they came from.

Where livestock do not meet the above criteria or the destination property will not accept the livestock or you were planning to cross a state border, you must stop and contact the jurisdiction's DPI to seek instructions before any further movement can be undertaken.



- Following livestock delivery, the vehicle must be washed down and disinfected before leaving the property. Where no truck wash facilities are available at the unloading site, the truck may proceed to a truck wash area other than a saleyard with livestock present.
- Do **NOT** abandon livestock or leave livestock loaded on the vehicle indefinitely. You have a duty of care to ensure the animals are delivered and unloaded at an appropriate approved destination.

Major EAD threats to Australia

EADs of concern	Species affected					
						
African swine fever (ASF)				✓		
Anthrax	✓	✓	✓	✓	✓	✓
Foot and mouth disease (FMD)	✓	✓	✓	✓		
Lumpy skin disease	✓					
African horse sickness (AHS)					✓	
Classical swine fever				✓		
Bluetongue	✓	✓	✓			
Hendra virus					✓	✓
BSE (Mad cow disease)	✓					✓
Scrapie		✓	✓			
Rift valley fever	✓	✓	✓		✓	✓

EADs of concern	Species affected					
						
Rabies	✓	✓	✓	✓	✓	✓
Aujeszky's diseases	✓	✓	✓	✓		
Sheep and goat pox		✓	✓			
Vesicular stomatitis	✓			✓	✓	✓
Peste des petits ruminants		✓	✓			
Porcine epidemic diarrhoea				✓		
Screw worm fly	✓	✓	✓	✓	✓	✓
Transmissible gastroenteritis				✓		

Other diseases of concern						
	Q-Fever	✓	✓	✓		
Scabby mouth		✓	✓			

Disease snapshots

Disease	Signs and behaviours	Species	Zoonotic
Anthrax	<ul style="list-style-type: none"> - sudden death - blood oozes from body orifices (eyes, anus) - blood does not clot, thick dark - swelling of the throat - lymph nodes enlarged. 	Cattle, sheep, goats, horses, pigs	Yes
Foot and mouth disease (FMD)	<ul style="list-style-type: none"> - blisters, lesions and sores on the mouth tongue, nose, feet, and teats - depressed, reluctant to move - weight loss, poor condition - nasal discharge and excessive drooling. 	Cattle, sheep, goats, pigs	No
African swine fever (ASF)	<ul style="list-style-type: none"> - sudden death - high fever - skin reddening - blueness of extremities (ears) - coughing & difficulty breathing - bloody diarrhoea - vomiting. 	Pigs	No
Lumpy skin disease	<ul style="list-style-type: none"> - discharge from eyes & nose, excessive drooling - multiple nodules all over body - lameness from inflammation of legs - nodules may leak fluid and be ulcerated. 	Cattle	No



FMD



ASF



ASF

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Bluetongue



Lumpy skin disease

©FAO
©NADIS

Disease	Signs and behaviours	Species	Zoonotic
Bluetongue	<ul style="list-style-type: none"> - excessive drooling, nasal discharge - depressed - difficulty breathing - reddened and ulcerated muzzle, lips and ears - lesions on feet, lameness - lips and tongue very swollen tongue is often bluish in colour. 	Sheep, goats *rarely cattle	No
BSE (Mad cow disease)	<ul style="list-style-type: none"> - typically seen in older cattle > 8 years - trembling, stumbling, swaying - behavioural changes (nervousness, aggression) - poor body condition. 	Cattle	Yes
Scrapie	<ul style="list-style-type: none"> - behavioural changes (increased nervousness or fear response, fixed stare, scratching) - high stepping or unusual hopping gait - tremors, grind teeth - collapse when handled - excessive wool loss. 	Sheep, goats	No
Rabies	<ul style="list-style-type: none"> - unusual aggression, fearfulness, neurological signs, dumb and dull - restlessness, paralysis of the legs - difficulty swallowing, drooling. 	All mammals	Yes



Sheep and goat pox



Vesicular stomatitis

©P.I.A.D.C

Disease	Signs and behaviours	Species	Zoonotic
Rift valley fever	<ul style="list-style-type: none"> - weakness, abortion and neonatal death - diarrhea - discharge from nose - vomiting. 	Cattle, sheep, goats, *rarely horses	Yes
Sheep & goat pox	<ul style="list-style-type: none"> - reddened lesions on muzzle, eyelids, ears and udder - lesions are fluid filled blisters or hardened scabs - lethargic, depressed - excessive drooling, difficulty breathing - discharge from the eyes and nose, swollen eyelids. 	Sheep, goats	No
Vesicular stomatitis	<ul style="list-style-type: none"> - blister like sores form in the mouth, gums, tongue, lips, nostrils, hooves and teats - excessive drooling - blisters swell and break leaving raw tissue - lameness. 	Cattle, pigs, horses	Yes

Other diseases of concern

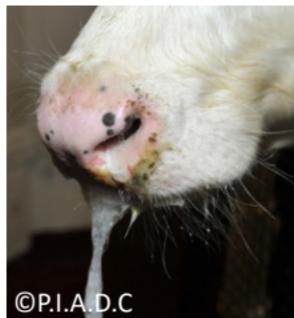
Q-fever	<ul style="list-style-type: none"> - no visible signs *abortion late in pregnancy on farm. 	Cattle, sheep, goats	Yes
Scabby mouth	<ul style="list-style-type: none"> - raised scabs with a red ulcerated area underneath the scab around the lips, muzzle and nostrils. 	Sheep, goats	Yes

Signs and behaviours

Blisters and lesions on lips, muzzle, tongue, above or between hoof claws



Excessive drooling, foaming, mucus and/or discharge from the nose and mouth



Signs and behaviours

Discharge and/or blood from eyes, nose and anus (inc. diarrhoea with blood)



Lameness, stiffness, abnormal posture, trembling, loss of coordination

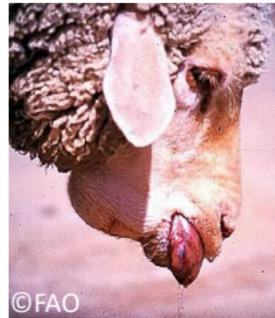


Signs and behaviours

Abnormal hair loss, skin lumps, maggot infested wounds



Swelling of lymph glands, lips, tongue



Unusual behaviours

- Depression i.e. head down, loss of appetite, isolated from herd
- Disorientated, nervous, aggressive
- Hypersensitive to sound, touch, light
- Reluctant to move, unwilling to stand
- Sensory changes - head tossing, teeth grinding, tongue licking, smacking lips, licking feet, muscle tremors
- Difficulty breathing.



Reluctance to stand, lameness, reddened skin.
Signs of African Swine Fever (ASF).

Always notify the **EAD watch hotline 1800 675 888** if you see high death rates and/or a high number of animals in a group suffering from the same condition such as abnormal skin lesions, lameness and/or excessive drooling.

If you suspect an EAD you must report it to the

**Emergency Animal Disease
Watch Hotline
1800 675 888**

Transporters have a crucial role in preventing or reducing the spread of disease.





Section 3

Livestock Transport Preparation



Preparing animals for transport

Correctly preparing livestock for transport is a vital part of any journey. Well prepared animals travel better, are less stressed and animal welfare issues are less likely to occur. Remember, if in doubt, leave it out. Generally, animals who are not fit to transport are not fit to be sold or processed at an abattoir.

Fitness of livestock for loading – All livestock must be checked against the following before loading:

- are fit for the intended journey
- can move freely and bear weight on all legs
- are not dehydrated
- are not diseased, ill or injured
- are not overly stressed
- have been fed and watered in accordance with curfew arrangements
- are accompanied by the appropriate paperwork and declarations
- are assessed and handled by competent staff.

IF IN DOUBT, LEAVE IT OUT

When loading livestock – Regulations state all animals must be able to stand upright without any part of the animal coming into contact with the roof, ceiling or cover of the vehicle. You must ensure all stock you are transporting have sufficient vertical clearance.

The following classes of livestock must be penned separately from other animals:

- different species
- livestock that differ greatly in size
- livestock that are pregnant or with young at foot, unless in groups together
- potentially aggressive and known aggressive animals, especially male species
- young or newly weaned livestock to be separated from older animals unless accompanying mothers
- horned livestock
- suspect animals*.



Sheep without sufficient vertical clearance

*Suspect animals are those with an ailment but deemed still 'fit to load'. It is best practice to mark these animals, load them to the rear of the truck and notify the saleyard/abattoir that they may require additional inspection.



Special requirements for transporting bobby calves

Bobby calves must be transported to meet the specified requirements on the NVD for calves, including:

- ❑ calves are aged between 5 and 30 days old
- ❑ bobby calves less than 5 days old must be transported directly to a calf-rearing facility
- ❑ calves are at least 23 kg live weight
- ❑ calves have been fed within 6 hours of loading and not transported in excess of 12 hours
- ❑ calves are able to walk on their own and are healthy and fit
- ❑ calves have a withered, dry umbilical cord
- ❑ calves have protection from excess heat, sun, wind and rain, in a vehicle that has at the least an enclosed front and that provides effective airflow. The vehicle may require overhead protection from the weather.

Calves must be handled gently and with patience at all times. Calves should be unloaded with care as they fatigue easily and may not follow other animals.

Maximum permitted time off water and minimum spelling periods

The tables below include time spent mustering and holding before loading, travelling and rest stops, and unloading until water is provided.

Species		Maximum time off water	Required spelling period
	Over 6 months	48 hours	36 hours
	Lactating cows with calf at foot	24 hours	12 hours
	Cows < 6 months pregnant (excluding last 4 weeks)	24 hours	12 hours
	Calves 30 days to 6 months	24 hours	12 hours
	Calves 5 to 30 days travelling without mothers (12 hours max journey)	18 hours	24 hours

	Pigs	24 hours	12 hours
	Lactating sow and piglets	12 hours	12 hours
	Weaners	12 hours	12 hours

Maximum permitted time off water and minimum spelling periods

The tables below include time spent mustering and holding before loading, travelling and rest stops, and unloading until water is provided.

Species		Maximum time off water	Required spelling period
	Sheep over 4 months	48 hours	36 hours
	Lambs under 4 months	28 hours	12 hours
	Ewes < 14 weeks pregnant (excluding last 2 weeks)	24 hours	12 hours

	Goats over 6 months	48 hours	36 hours
	Kids under 6 months	28 hours	12 hours
	Goats < 14 weeks pregnant (excluding last 2 weeks)	24 hours	12 hours

		Maximum transport time	Maximum time off water	Minimum spelling period
	All species in last two weeks of gestation	4 hours	4 hours	24 hours

Livestock penning densities

The following livestock densities in the tables are the recommended upper limits. The livestock transporter should always consider varying these densities in response to extreme weather conditions, shorn or full wool, horn status and live weight.

CATTLE		
Mean live weight (kg)	Minimum floor area (m ² /head) standing	Number of head per 12.5m x 2.4m deck
100	0.31	94
150	0.42	70
200	0.53	55
250	0.77	38
300	0.86	34
350	0.98	30
400	1.05	28
450	1.13	26
500	1.23	24
550	1.34	22
600	1.47	20
650	1.63	18

Livestock penning densities

PIGS					
Average live weight (kg)	Pen length				Space allowance (m ² /head)
	3 metre		4 metre		
	Min. no	Max. no	Min. no	Max. no	
50	30	33	40	44	0.22
75	21	25	31	34	0.29
100	19	21	25	28	0.35
125	15	19	21	23	0.42
150	13	15	18	20	0.48
175	12	13	16	18	0.55
200	11	12	14	16	0.61



SHEEP		
Mean live weight (kg)	Minimum floor area (m ² /head) standing	Number of head per 12.5m x 2.4m deck
20	0.17	176
30	0.19	157
40	0.22	136
50	0.25	120
60	0.29	103

GOATS		
Mean live weight (kg)	Minimum floor area (m ² /head) standing	Number of head per 12.5m x 2.4m deck
20	0.15	200
30	0.17	176
40	0.22	136
50	0.25	120
60	0.28	107

Fitness to load checklist

It is the responsibility of the livestock transporter to ensure that all animals are fit to load and fit for the intended journey before they are loaded. Remember to refer to this checklist before you load livestock.

The animal:

- can walk on its own by bearing weight on all four legs
- is free from visible signs of disease, severe injury, distress or conditions likely to further compromise its welfare during transport
- is strong enough to make the journey (i.e. not dehydrated or emaciated)
- is not suffering from heat stress (i.e. visibly panting)
- is not in late pregnancy or too young to travel (refer to the Standards to determine limits for late pregnancy)
- has met the maximum time off water standards (see pg. 25/26)
- can see well enough to walk, load and travel without impairment or distress (i.e. not blind in both eyes).



If all boxes are ticked, the animal is fit to load.



If one or more boxes are unticked, the animal is not fit to load.

Understanding 'fitness to load'

Term	Further explanation
Your responsibility	Penalties for animal cruelty offences vary in each jurisdiction, but all have provisions for jail terms and fines. As the responsible person, you and your company are liable for these penalties. Remember you are responsible for the animals when they are loading, during the journey, unloading and the final inspection ensuring they were fit to load and travel.
Walk on its own bearing weight on all four legs	An animal that is in pain might bear weight on all legs but will not be walking normally i.e. head bobbing, reluctant to move or standing with an arched back. A condition in an animal that is affecting their movement strongly indicates the condition is painful. Lameness is more likely to go down in the truck. Veterinary advice should be sought e.g. for journey length, stocking density.
Free from visible signs of distress	You should have adequate experience and stockmanship skills to recognise when an animal is stressed and not expressing normal behaviour. Signs of stress include: panting, sweating, drooling, vocalisation, flighty or freezing on the spot.
Not dehydrated	Signs of dehydration can vary between species and difficult to determine without a close examination. Signs include: lethargy, sunken eyes, dry membranes/mouth. Therefore knowing when the animals last had access to water is the key point to ask the consigner before transporting the animals. Drivers should know when the animals last had access to water. Without a journey log, you need to ask.
Adequate access to water	You should always seek information about how long animals have been off water. This should be noted in your journey log. Include details of the person providing the information.

Term	Further explanation
Late pregnancy	Industry best practice recommends that animals in the last 4 weeks of pregnancy should only be transported under veterinary advice and should not be consigned to a saleyard or abattoir.
Not suffering from heat stress	In Australia it is difficult to always avoid extreme weather conditions. General signs of heat stress include: open mouth panting, lethargy, increased drooling. There are several things you can do to prevent heat stress: ensure you are not exceeding TOW, transport animals early in the morning, reduce stocking density, increase ventilation by keeping the truck moving and stops to a minimum, park in a shaded area.

Before loading animals, it is important to check with the responsible person how long they have been off water and feed to ensure you are within the limits permitted for on-going travel. This should be done at the start of all journeys regardless of the start point or destination. i.e. farm, saleyard, abattoir.



The densities of these pens do not allow the animals to move freely, lie down, rest or have reasonable access to water.

Unfit to load animals

The following pages show images of animals that are **NOT FIT TO LOAD**.

Any animal found collapsed during transport or on arrival must be treated immediately or humanely destroyed. Dragging or carrying a downed animal is not permitted. Seek veterinary advice if required.

If you are concerned about the welfare of any animal or the signs and/or behaviours they are showing contact a local veterinarian or the primary industry department in your state/territory.



IF IN DOUBT, LEAVE IT OUT

Signs of lameness include:

- bunny hopping
- head bobbing
- knuckling over
- carrying one leg when standing or walking
- arched back
- isolation/holding back from herd
- swollen joints
- reluctance/refusal to stand or walk.

Lameness can be due to:

- leg deformities
- foot abscess
- recent/old injury
- old/new fractures
- footrot
- arthritis
- laminitis
- infected lesions
- long claws.

A condition in an animal that is affecting their movement strongly indicates that the animal is in pain.



Both animals are expressing pain, arched back, head down



Recent injury, fracture



Leg deformity



Leg injury



Old injury, crippled leg



Knuckling over, emaciated



Long hoof claws

Visible signs of disease, injuries and conditions include, but not limited to:

- ingrown horns
- hernias
- udder infections
- mastitis
- scabby mouth
- cancer
- enlarged testicles
- swollen pizzle
- lumpy jaw
- refusal to stand or walk
- full udder
- fly strike
- pink eye
- photosensitisation
- broken leg
- infected wounds
- new/old injuries
- panting/dfficulty breathing.



Cancer on nose



Injured horn



Photosensitisation



Lumpy jaw



Pink eye



Hernia



Swollen testes



Ingrown horn



Tail biting wound



Swollen jaw (abscess)



Swollen udder, mastitis



Swollen, inflamed broken pigzle



Prolapse



Scabby mouth



Panting - Heat stress

Blindness or eye cancer

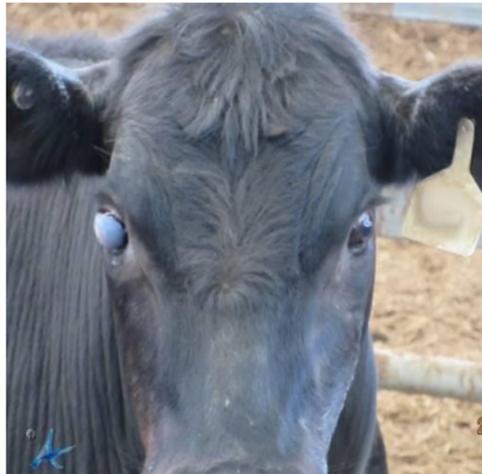
Examples of conditions include:

- eye cancer*
- blind in both eyes
- eye diseases i.e. pink eye, severe conjunctivitis
- injuries
- skin cancer.

*In some cases, it may be acceptable to transport animals with small eye cancers (less than 2cm), provided the lesion is free of discharge and not infested with fly larvae. If in doubt, consult a veterinarian.



Eye injury - pre-existing



Eye injury



Eye cancer



Emaciated



Sunken eyes (dehydrated)
expressing pain in facial expression



Emaciated,
photosensitisation



Emaciated

Late pregnancy

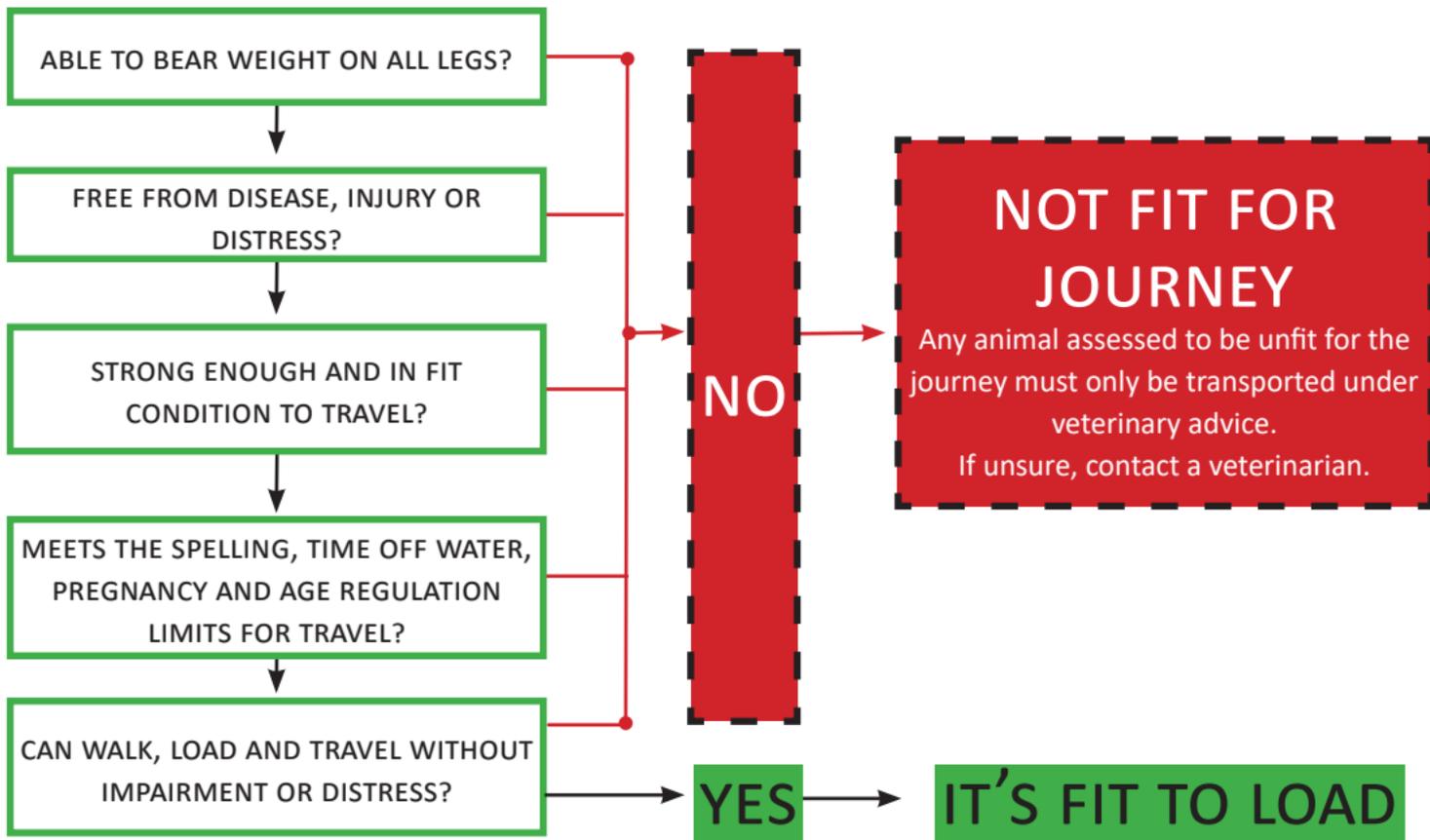


Heavily pregnant, full udder



Heavily pregnant

Fit to load - Decision flow chart



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