MEAT & LIVESTOCK AUSTRALIA

Handbook of best practice guidelines for the Australian feedlot industry

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Introduction

The aim of this handbook is to provide a concise guide and reference document for feedlot operators and their employees to promote improved practices in the Australian feedlot industry.

The handbook is a tool to assist feedlot operators in setting guidelines, identifying outcomes and key operational procedures for best practice standards in alignment with the National Feedlot Accreditation Scheme (NFAS). The document is not a substitute for the quality management system in feedlots but rather a practical guide for feedlot operators to consider in their operational and management programs.

The handbook can be used to assist in the training of employees, the development of in-house procedures and to review requirements for feedlots over time.

1. Administration

1.1 Feedlot amenity

Visitors to the feedlot should be provided with clear instruction as to their obligations, access and safety on site. It is recommended that the feedlot has:

- clear and well positioned signage
- good visitor access control
- strategies to ensure the site and livestock have a good visual appearance.

Guidelines

First impressions

- entrance to feedlot should be secure, tidy and clearly signed
- restrict entry and enhance biosecurity by securing entrance gates out of normal business hours
- have clear, well positioned biosecurity signage in place e.g. a 'Livestock Biosecurity Area' sign
- have clear, well positioned quarantine signage in place e.g. a 'Quarantine Area' sign
- put up signage for visitors e.g. 'warning – no entry without permission from the land owner' or 'by appointment only' signs
- have a single admission point for visitors where a biosecurity check and record is undertaken, visitors are instructed on any WH&S obligations and business QR codes are available for sign in
- put up appropriate safety signage e.g. signage to show speed limits, no entry areas or machinery in operation.

Remember: welcome visitors but always ensure a sound management process for biosecurity and safety.

Feedlot amenity

Task	Frequency of completion
• remove dead stock immediately on identification from pens to carcase disposal area • check all carcases are buried or covered over in decomposition site • take dust control measures on roadways, cattle lanes/alleys, livestock handling and feed preparation areas • operate mechanical equipment used on site in accordance with the manufacturer's specifications • manage safety, speed, noise and dust of vehicle movements and machinery operations within the feedlot complex.	Daily
• remove spilt feed from roadways or more frequently where required • monitor carcase disposal area to prevent environmental harm or nuisance • maintain short grass cover in feedlot complex and immediate surrounds by mowing or slashing grass • time manure and effluent applications with consideration of prevailing and forecast weather conditions.	Weekly
• keep visual screens (vegetative buffers) in good order • inspect drainage channels, sedimentation systems and storage lagoons – clean or repair as necessary	Monthly

Remember: feedlots can be operated to enhance public perception and prevent or minimise adverse impacts on people, livestock and the surrounding community.

1.2 Training

Regardless of the size of the business, human resource areas that need to be addressed in feedlot operations include personal health and wellbeing, communication, roles and responsibilities, working conditions, training and skills development.

Employees should be adequately trained to ensure they have the appropriate skills and knowledge to competently perform the duties required of them by the NFAS Standards and the business's standard operating procedures.

To achieve this, feedlots should ensure that:

1. Job descriptions and responsibilities for all team members (including family members working on the property/in the business) are documented.
2. All team members have appropriate training in the requirements of the NFAS Standards and other relevant industry code of practice requirements and suitable records of this training are maintained.
3. All Quality Assurance (QA) Officers are familiar with the requirements of the NFAS Rules and Standards including all current NFAS Advices and Circulars and suitable records of this training are maintained.
4. People involved in the supervision of the use of farm chemicals have sufficient skills and knowledge to ensure their safe and responsible use and have undertaken recognised chemical user training.
5. For the purposes of the NFAS, continued competency in relation to chemical preparation, application, transport, handling and storage may be demonstrated through successful completion of the Scheme's annual audit requirement (Note: participants should be aware that in some states there may be other legal obligations that apply with respect to holding current chemical user certification for purposes other than the Scheme).
6. A register of people authorised to use agricultural and veterinary chemicals is maintained (some people may have clearly defined limits to their authorisation).

Guidelines

Position descriptions

- document position descriptions for each role in the feedlot
- each quarter, review position descriptions for relevance and update as required.

Skills and knowledge

Task	Frequency of completion
• explain policies and procedures to new employees and record training events in the training register.	When onboarding new employees
• review WH&S systems and record training events in the training register.	Monthly
• review training and certification of employees.	Quarterly
• review and update policies and procedures, as well as recording any training events in the training register.	Every six months

NFAS

Task	Frequency of completion
• explain the NFAS Rules and Standards, quality management system, codes of behaviour and practices to new employees • record training events in the training register.	When onboarding new employees
• review training • deliver and record training as required • review and upgrade reference material as required • review the skills of the Responsible Person, QA and Animal Welfare Officers and provide training as required, recording any training in the training register.	Quarterly

Agricultural and veterinary chemicals

Task	Frequency of completion
• review and update chemical use and users' register.	Monthly
• review employee skills and knowledge in relation to using farm and animal health chemicals • provide accredited training to key employees using and supervising the use of farm and animal health chemicals • review and update training register as required • review and update chemicals in use, including animal health and veterinary products.	Quarterly

Reference: *National Feedlot Accreditation Scheme (NFAS) Rules and Standards*

1.3 Internal auditing and corrective actions

Internal audits should be performed by the feedlot to review ongoing compliance of the enterprise's activities to the NFAS Standards and the business's standard operating procedures. Appropriate corrective and preventative actions are undertaken when non-conformances are identified.

Internal audits are performed on procedures, records and property facilities at least once per annum. An additional dedicated animal welfare internal audit is conducted at a six-month interval to the full internal audit.

Internal audit or inspection reports are documented. Identified non-conformances and opportunities for improvement (including complaints) are documented and reviewed. Details of any corrective actions should also be recorded. A corrective action report (CAR) or equivalent record is maintained when:

- a defect or mistake is identified during an internal audit, or by an external auditor or assessor
- a defect or mistake is identified during routine on-farm activities which cannot be rectified that day
- a complaint is received from a purchaser or processor of your product
- an adverse reaction to a chemical or an unexpected treatment failure has occurred
- product is identified as being potentially contaminated.

Continuous improvement of the business is demonstrated through preventative action being taken to prevent any similar problems occurring.

Guidelines

Internal audits

Task	Frequency of completion
• Undertake an internal audit of all livestock practices and handling facilities.	Quarterly
• undertake internal audit of commodity storage, feed preparation and distribution and records • undertake internal audit of workplace, including health and safety of employees.	Every six months
• undertake internal audit of procedures • undertake internal audit of records and processes • undertake review of internal auditors and skills, providing training where required.	Annually

Records and Reporting

- identify, record, review, manage or correct non-conformances
- share results of internal audits with employees to provide opportunities for improvement
- maintain a log of non-conformances and steps taken to rectify them to encourage continual improvement
- focus employees on preventative actions and procedural improvements.

1.4 Records

Records should be kept by the feedlot to provide documented evidence of the enterprise's compliance to the NFAS Standards and the business's standard operating procedures.

Complete, legible and accurate records should be maintained and retained for a sufficient period of time for historical reference.

Guidelines

Recommended administration records and activities:

- development applications
- environmental license from state government
- local and state jurisdiction approvals
- feedlot property identification code (PIC) (state government)
- feedlot license
- employee records including contracts
- training records, including a training register
- National Feedlot Accreditation Scheme (NFAS) accreditation – AUS-MEAT Ltd
  Livestock Production Assurance (LPA) accreditation – Integrity Systems Company (ISC)
- Meat Standards Australia (MSA) accreditation – Meat & Livestock Australia (MLA)
- registration of PIC with the National Livestock Identification System (NLIS)
- internal audit records
- external audit records for NFAS and additional programs (LPA, MSA, EUCAS)
- complaints register – includes details of the nature of any complaint received, the response made and any mitigation measures
- weighbridge – receival and dispatch tickets/dockets
- commodity declarations
- livestock declarations
- contract register containing all the contracts for commodities, livestock, consultants, preferred suppliers
- chemical register of farm and livestock products

- pen cleaning and maintenance schedule
- contingency planning – identify risks and mitigation strategies
- daily activities record log e.g. breakdowns, interruptions, events
- WH&S log of near misses and injuries
- documentation of administration procedures for records, database management, payroll, delegations, reporting
- documentation of data checking and verification procedures
- emergency procedures – designated safe area, contacts, responsibilities
- fuel storage records around safety, deliveries, usage.

Commodity

Task	Frequency of completion
• record purchases (in) and usage or sales (out) • record feed ingredients mixed (prepared by load/batch) and distributed to livestock (fed out – by lot and pen) • reconcile inventory (theoretical).	Daily
• review commodity contracts (in/out) and reconcile against deliveries to date.	Weekly
• reconcile inventory (theoretical) with physical stocktake.	Weekly or monthly

Livestock

Task	Frequency of completion
• record incoming and outgoing livestock movements (including deaths, transfers) • record animal health treatment by animal/lot/pen, chemical batch/DOM, withholding period (WHP), export slaughter interval (ESI) and ailment • record all internal movements from pen to pen, lot to lot, paddock to pen, pen to paddock • reconcile inventory – cattle on hand (theoretical) • monitor cattle during excessive heat load events.	Daily
• review livestock contracts (in/out) • monitor livestock performance, including health, welfare, close-outs and grading feedback.	Weekly
• monitor feedlot performance, including feed production, mixing & delivery, livestock performance.	Monthly
• reconcile inventory (theoretical) with physical stocktake.	Every six months or annually
• formally review the Risk Assessment Program (RAP) in Katestone • review the feedlot's excessive heat load management plan and implement changes prior to the summer season.	Annually

By-products

- record pen cleaning activities – estimated solid manure removal from each pen
- record solid manure handling activities – windrow turning, wetting, additives, movements or sales
- record effluent utilisation activities – blending, irrigation.

1.5 Document control

All documents relevant to the business's standard operating procedures and quality system (including the NFAS Standards) should be controlled to enable the review of their currency. Out of date or superseded documents should be withdrawn and replaced with the new version.

Some important steps feedlots should take to ensure document control include:

- controlling all business standard operating procedure documentation to ensure only current documents are in use
- controlling all quality system documentation to ensure that only current documents are in use
- ensuring all documentation in use by the enterprise accurately reflects current management practices and procedures
- maintaining an updated list of all controlled documents that identifies the document date of issue, numbers of the document in circulation and where they are stored
- including the current NFAS Rules and Standards on the controlled document master list.

Guidelines

Recommended administration activities

Task	Frequency of completion
• development and maintenance of controlled document master list • inform and train employees on updates to quality system, supporting plans and production plans.	Ongoing, as required
• review document list and update as required • review and update quality system manual (NFAS) and supporting plans (biosecurity, excessive heat load, pregnant heifer management, antimicrobial stewardship and contingency plans) • review and update production plans for LPA, MSA, EUCAS and brand programs.	Quarterly
• update documentation to relevant and updated material only.	Annually

1.6 Chemical inventory

Only legally obtained and properly labelled chemicals should be available for use on the property and an accurate inventory of all chemicals purchased and stored on the enterprise should be maintained.

To achieve this, feedlots should:

1. Maintain sufficient records to enable the traceability of the purchase, storage, handling and disposal of chemicals.
2. Ensure feedlot chemical storage areas are secure (the minimum definition of secure is child proof). Separate areas should have been designated for each category of agricultural chemical (for example, insecticides and herbicides), veterinary chemical, chemical awaiting disposal and protective clothing if these items are stored in a particular area.
3. Ensure all agricultural and veterinary chemicals on the property are stored safely according to the directions on the container label.
4. Maintain a chemical inventory or equivalent system that records the following at each chemical storage area on the property for chemicals already held on the property. All newly purchased chemicals should be recorded in the feedlot chemical inventory or equivalent system, adequately labelled and in an acceptable condition when received. The following details should be recorded for each chemical on the property:

- date received
- batch number
- place of purchase
- name of chemical
- quantity
- for veterinary chemicals, the expiry date
- for stored agricultural chemicals, the date of manufacture or expiry date, if provided.

5. Conduct stocktakes annually at a minimum for agricultural chemicals and every six months for veterinary chemicals. These stocktakes identify any products that have exceeded their label expiry dates or are no longer useable which should be segregated for appropriate disposal.
6. Ensure products not in their original containers or with illegible labels, expired use-by dates and leaking or corroded containers are disposed of responsibly following manufacturer's instructions where supplied. Records in the feedlot chemicals inventory or equivalent system should contain:

- those listed chemicals that have been disposed
- the method of disposal
- the date of the stocktake
- the name of the person who carried out the stocktake and carried out or supervised the disposal of chemicals.

7. Reconcile inventory stocks and actual stocks of chemicals used on grain while in storage every six months.

Guidelines

Task	Frequency of completion
• record in inventory all chemicals purchased, noting the date, supplier, chemical name, batch, DOM/expiry date and amount purchased • record in inventory all chemicals used, noting the date, chemical name, batch, DOM/expiry date, amount and reason for use • record in inventory all chemicals disposed of, including date, chemical name, batch, DOM/expiry date, amount, reason, method of disposal.	Daily
• reconcile chemical inventory (theoretical) with physical stocktake of farm and veterinary chemicals.	Weekly
• reconcile inventory at the end of financial year stocktake.	Annually

1.7 Review of product requirements

Proposed arrangements for the sale of product being certified through the application of NFAS Standards should be thoroughly reviewed prior to acceptance by the feedlot.

To ensure this, feedlots should make certain that:

1. Proposed arrangements are reviewed and approved by a person in a position of authority prior to their acceptance.
2. Each order or contract applicable to NFAS certification is reviewed to ensure the feedlot can meet the requirements of the contract.
3. A record of the agreed arrangements is initialled and dated by the person performing the review as evidence that the review was completed.

Guidelines

Task	Frequency of completion
• review, complete and record in the contract register any contracts for the delivery of livestock.	Daily
• reconcile executed and outstanding contracts, including any adjustments (delivery date, numbers of head, specifications, approved programs and documentation).	Weekly
• reconcile contracts for delivery with livestock on hand.	Monthly

1.8 Notification of non-conforming product and/or product recall

Systems should be in place at feedlots to identify and communicate non-conforming product following a predetermined plan. Particularly, feedlots should have procedures in place to ensure that the consignee is immediately notified when any animals dispatched from the feedlot are identified as non-conforming product.

Non-conforming product includes product with:

- food safety concerns, including sending animals to slaughter that:
    a. are still within the WHPs or ESIs for animal health treatment residues such as antibiotics, anthelmintics, hormone growth promotants or anti-inflammatory drugs
    b. have had access, either directly or through contaminated feed or water, to agricultural chemicals (fungicides, herbicides and insecticides) or environmental and industrial contaminants (organochlorines and metals)
    c. have had access to restricted feeds (e.g. restricted animal material (RAM)) or biosolids
- product integrity concerns, including:
    a. the incorrect completion of NFAS Delivery Dockets and LPA National Vendor Declarations for non-food safety related concerns such as time on feed
    b. the false declaration of non-HGP treated cattle
- customer requirement concerns, including sending animals to slaughter that fail to meet customer specifications.

Records of non-conforming products should be maintained in accordance with internal audit corrective procedures, which may include the:

- nature of the incident
- time/date of the incident
- notification of stakeholders (buyers) of the incident
- any actions taken to rectify incident

A simulated product recall should be practiced annually by the feedlot and documented to ensure all responsible staff members are fully aware of the actions required when a critical incident occurs.

Guidelines

Task	Frequency of completion
• a responsible person notifies as soon as practical the relevant organisations of any food safety or product integrity concerns, or any customer requirement concerns, for cattle presented as fit for purpose.	When an incident occurs
• review any notification from off-takers (customers, processors, importers) that livestock supplied were non-conforming in relation to WHP/ESI, contamination, inaccurate or false declarations, or customer concerns and take remedial action immediately • record all notifications (time, date and nature), outcomes, remedial actions and preventative measures in the non-conformance log.	Daily
• review all notifications to ensure corrective procedures have been identified, recorded, communicated and executed • update policy and procedures as required • conduct training as required.	Monthly
• review the notification framework (predetermined plan) for the feedlot • undertake a simulated product recall and document to ensure employees have practiced the required actions in a critical incident.	Annually

1.9 Risk assessment and contingency planning

Systems should be in place at the feedlot to identify and mitigate the impact of potential emergency situations.

Feedlots should maintain a register of risks that have the potential to negatively impact on the feedlot's ability to care for people, animals and the environment. Potential risks include but are not limited to:

- water supply and suitability
- feed supply and suitability
- effluent discharge
- electricity outages
- access to site
- staff levels
- outbreak of disease
- extreme weather conditions including storms, flooding, Excessive Heat Load events
- trespassers
- emergency slaughter of cattle and disposal
- cyber security.

Contingency plans for identified risks should also be documented and include:

- actions to mitigate identified risks
- allocation of responsibilities to relevant personnel.

The risk register and associated contingency plans should be reviewed as part of internal audit procedures.

Guidelines

Contingency planning

Each year, feedlots should:

- review systems that are in place to identify and mitigate the impact of potential emergency situations, including:
    a. water supply and suitability
    b. feed supply and suitability
    c. electricity supply
    d. fuel and energy supply
    e. disease outbreak
    f. extreme weather conditions – flooding, excessive heat load
    g. antagonists and trespassers
    h. emergency slaughter of cattle and disposal
    i. product or cattle recall
    j. transport interruption (road closure, truck rollover, abattoir closure)
    k. plant or equipment failure
    l. IT interruption (systems security and hackers)
    m. other factors including interruptions to employees (e.g. influenza, COVID-19).
- update the risk register (contingency plan) with actions and allocation of responsibilities
- provide training to key personnel for contingency planning.

Remember: the priority is to prepare for the worst and manage the rest.

1.10 Calibration

Feedlots should have systems in place to ensure that equipment used to measure, weigh or administer are regularly cleaned and calibrated.

Equipment used for measuring, weighing or administering products should be checked for operational efficiency prior to use and is subject to regular calibration. Records of calibration activities are maintained which note the date, description equipment, method and person responsible.

Guidelines

Weighbridge

Task	Frequency of completion
• clean platform and check connections, scales and displays.	Weekly
• conduct an internal calibration check.	Monthly
• conduct a third party calibration and check.	Quarterly

Commodity

Task	Frequency of completion
• check scales and displays on milling apparatus, loaders, batch boxes and feed trucks.	Daily
• conduct an internal calibration check on milling apparatus, loaders, batch boxes and feed trucks.	Weekly
• conduct a third-party calibration and check on milling apparatus, loaders, batch boxes and feed trucks.	Quarterly

Livestock

Task	Frequency of completion
• check scales and displays on weigh boxes and livestock crushes • check and calibrate dosing instruments for administering livestock products.	Daily
• conduct an internal calibration check on weigh boxes and livestock crushes.	Weekly
• conduct a third-party calibration and check on weigh boxes and livestock crushes.	Quarterly

1.11 Trespass

Feedlots should implement systems to prepare and respond in the event of an activist incursion on the property and provide for the safety of people and the well-being of livestock. Use the below checklist to prepare the facility and manage activist incursions.

Guidelines

Preparing the facility to prevent trespass

- restrict entry using entrance gates that are kept closed and locked where practical
- engrave the rural mail box (RMB) number and property name on entrance gates for emergency service recognition
- ensure fences are secure to help define the property boundaries and restrict access
- erect clear signs at point(s) of entry for visitors e.g. *'warning – no entry without permission from the landowner'* or *'by appointment only'*
- erect signage confirming the feedlot is a 'Quarantine Area' or 'Livestock Biosecurity Area'
- photograph and date-log signs in position, for future reference in investigations by police
- install CCTV video surveillance systems at designated points and identify these points
- be alert
- report any unusual activity such as persons in and around property, unfamiliar vehicles or drones to local police
- limit unannounced visitors to site
- request or require that all visitors are screened prior to approval for entry to the feedlot
- block vehicle access to the feedlot outside normal business hours
- lock all offices and vehicles.

Remember to engage with authorities early and create awareness of the issue.

In the event of an activist incursion

- stay calm– communication must be consistent, clear and cordial
- do not display signs of confrontation – do not show verbal aggression or engage physically
- request identification
- request the intruders leave the property – see an example of a trespass directive in Appendix A
- communicate with staff to provide clear instruction on work program continuity and how to congregate for safety if necessary
- request for police assistance or register a complaint – call 000 in an emergency then the Police Assistance Line (131 444) or the local police station for less urgent requests
- focus on collecting evidence of the trespass
- take date stamped footage of the incursion
- record details of the trespassers e.g. their vehicle registration
- record illegal drone activity, including flight path (over or above people and at what height approximately) of drone and how it is affecting safety (people and livestock).

Remember the priority is to remain calm and professional, while recording the actions of trespassers and keeping people safe.

De-escalating the incident

- only owners, managers or supervisors are to engage with trespassers – all other people should be requested not to engage in conversation
- communication must be consistent, clear, calm and cordial
- ensure a minimum of two employees always remain in attendance with the owner, manager or supervisor
- ask questions of intruders – e.g. 'Who is in charge?' or 'Who gave permission for you to be on the property?'
- read trespassers the trespass directive provided in Appendix A
- politely inform trespassers they have no permission to be on the property and ask them to leave and move to public property
- acknowledge protestors have a right to protest but not on private property
- advise trespassers that they are compromising biosecurity and potential wellbeing of livestock, so they should leave the property
- tell intruders that company policy requires that the police be informed of trespassers
- do not threaten harm
- do not answer any questions – particularly personal
- do not argue about the protest/cause
- do not discuss livestock or business practices
- do not disclose where livestock or equipment is housed or stored,

Remember to work sensibly and professionally around the event and be cautious.

After the event

- contact the Australian Lot Feeders' Association (ALFA) regarding any media enquiries
- ALFA will facilitate an industry response if needed
- make a complaint or report the incident to police
- provide timely and accurate evidence to police of the incident
- consider legal action, including the ability to sue identified intruders
- record staff or security resources used, time lost, transport delays, animal welfare, lost production, safety issues, damage (including biosecurity and quality assurance risks), footage and recordings, personnel notes on the incident (best made immediately after incident)
- police will identify an offence has been committed if notified of the incident and will instruct employees on any further steps necessary to resolve the incident, including prosecution of trespassers.

Social media check-up

- instruct employees and contractors to refrain from all social media comment regarding the incursion
- undertake a check of privacy settings on all business social media accounts to restrict or protect content

Remember: sharing positive images of well-run feedlot facilities create a better outcome than inappropriate commentary on social media.

1.12 Feedlot policy

Feedlots should implement systems to document the policy framework for the feedlot. Use the below list as a guide to prepare policies applicable to employees at the feedlot.

Guidelines

Possible areas to prepare policies on include:

- letters of appointment for employees
- training
- induction
- responsibilities
- position descriptions
- vaccinations
- performance reviews
- hours of work
- breaks
- remuneration
- income tax
- superannuation
- allowances e.g. for tools, horses, shoeing or tack
- reimbursable expenses
- annual leave
- sick leave
- personal or special leave
- public holidays
- worker's compensation
- education assistance
- keys for premises
- purchase orders
- purchase limits
- mobile telephones
- computers
- motor vehicles – private, business
- horses
- dogs
- personal equipment
- family members
- visitors
- human disease (e.g. restrictions for COVID-19).

1.13 Feedlot procedures

Systems should be implemented to document procedures for feedlot activities. Use the below list of feedlot operations and activities to prepare documented procedures for the feedlot's operation.

Guidelines

Feedlot operations and activities that may require documented procedures include:

Plant

- maintenance and cleaning of plant
- feed truck operation
- articulated loader operation
- loader operation with crane or forks
- tractor operation
- tractor operation with forks
- skid steer operation
- skid steer operation with trencher
- tipping truck operation
- working at heights.

Equipment

- maintenance and cleaning of equipment
- generator operation
- brush cutter operation
- mower operation
- slasher operation
- chainsaw operation
- fuel storage equipment
- fire extinguishers.

Workshop

- hot works management
- welding
- oxy cutting
- using an angle grinder
- using a docking saw
- spray painting
- lifting vehicles using hydraulic jacks
- pedestal grinder
- personal protective equipment (PPE)
- fuel and energy storages
- fire extinguishers.

Livestock

- maintenance and cleaning of livestock handling equipment
- receival of cattle, including unloading, inspection, assessment and records
- loading and unloading ramp operation
- transfer of cattle
- drafting gate operation
- induction crush operation
- hospital crush operation
- wash out facility operation
- firearm register and storage cabinet.

Commodity handling area

- mill operation
- boiler operation
- tub grinder operation
- liquid storages and dispensers
- conveyor belts and augers
- grain delivery pit
- electrical motors, pumps and lockouts
- cleaning commodity shed gutters
- fire extinguishers and/or firefighting plant.

Grain handling plant

- welding
- working on milling plant e.g. augers, elevators
- confined spaces
- electricity
- ladders
- servicing and repairing of plant
- working at heights
- fuel supply.

Weighbridge

- grain sampling
- maintenance and cleaning of weighbridge

Farm

- portable auger operation
- all-terrain vehicle operation
- quad bike operation
- motor bike operation
- loading and unloading hay
- spraying
- post hole digger
- irrigation, including pumps, channels andpits
- firefighting plant.

Administration

- lifting and storing office equipment
- electric cables
- security, including cybersecurity and security of records, databases, buildings, feedlot site.

Cleaning

- amenities, including kitchens and bathrooms
- offices, including administration, weighbridge, mill, livestock and workshop offices
- meeting rooms.

1.14 Safety responsibilities

Safe workplaces feature awareness and communication and are places where both workers and employers share responsibility for safety.

WH&S legislation recognises that actions taken to protect people from risk need to be 'reasonably practicable'. Some of the safety responsibilities at a feedlot include:

Risk management

Good practice requires that hazards be identified and risks eliminated or minimised so far as is reasonably practicable. Safe work procedures should be developed and implemented in consultation with all staff for all activities that pose a risk.

Training and supervision

As part of their primary duty of care, employers must provide adequate safety training, information and instruction to employees. Once safe work procedures have been developed, these procedures can provide the basis for a training program. Some degree of supervision is necessary to ensure that safe work practices are being followed. It is important to keep a record of what training has been provided (e.g. a training register). A structured and documented training program, which can be as simple as a checklist of competency for identified work procedures, will help ensure the required training is being provided.

Worker induction and records

Worker inductions delivered to new workers set the framework for safety in the workplace. Expectations can be clearly established, while expected work practices and procedures are outlined and emergency procedures detailed. Creating and using an induction checklist will help with ensure all necessary topics are discussed. Inductions are an ideal opportunity to collect critical worker information, including contact details, next of kin, payroll details and health issues. It is important that inductions are recorded in some way. Ideally, this should be on an induction document that lists the topics covered and is signed and dated by both employer and employee.

Visitor induction

Visitor inductions are related to feedlot safety but can also help with biosecurity control. Running through a simple checklist of safety and biosecurity issues with visitors and recording this in a visitor's register is sound practice. A visitor register can be compiled and signed by visitors after they have listened to or read about potential safety or biosecurity issues before they enter the workplace. Regular visitors may only require an initial induction.

Emergency response plans

List emergency contacts where this information can be easily accessed by all employees and family members in an emergency situation. Document emergency procedures to help ensure all aspects are covered (contingency plan).

First aid

Rural workplaces must ensure that suitable and adequate first aid equipment is provided at the workplace. Each worker should have access to the first aid equipment and to facilities where first aid can be administered. An adequate number of workers should also be trained to administer first aid.

Personal protective equipment (PPE)

PPE is clothing or equipment designed to be worn by someone to protect them from risks of injury or illness. PPE is the least effective method of controlling a risk. PPE should only be considered as a control measure when exposure to a risk cannot be minimised in another way or used with other control measures as a final barrier between the worker and the hazard. PPE must be appropriate to the risk, kept in good working order and be available. The worker must use the PPE in accordance with information, training and instruction provided in relation to its use.

Environmental hazards

Environmental factors to be considered from a WH&S perspective include dust, high or low temperatures and sun exposure. Procedures need to be implemented to reduce the risk of injury or illness resulting from environmental hazards.

Incident reporting

Under state legislation, any incident that results in the death, serious injury or serious illness of a person or that involves a dangerous incident must be reported, if that incident resulted from the conduct of the business or undertaking.

Chemical use and records

Chemicals used in feedlot enterprises must be stored and used in a manner that is safe for people, stock and the environment, while complying with relevant legislation and regulations. Chemicals include pesticides, herbicides, animal health and veterinary products.

Chemical use

Chemicals must be used as per label directions. The product label lists the purposes for which the product is approved for use and provides the directions for use. Products must only be used for their intended purposes, in accordance with the instructions on the label. Safety data sheets (SDS) must be readily available for people using the chemicals. These sheets list PPE required and important information regarding use and storage of the chemical. WHPs and ESIs are generally noted on the label but can also be found on the Australian Pesticides and Veterinary Medicines Authority (APVMA) website. The WHP and ESI must be noted and adhered to for all agricultural and veterinary chemicals.

Chemical use training

Anyone involved in the storage and use of chemicals in the workplace must be properly trained. The training should be applicable to the workplace and the work being done and must take into account the needs of the workers, including literacy levels, work experience and skills required for the job.

Chemical records

Records of chemical use are particularly important for protecting the reputation of Australia's livestock industries as a source of safe and traceable red meat. Good records allow claims made on the Livestock Production Assurance (LPA) National Vendor Declaration and Waybill (LPA NVD/Waybill) to be substantiated.

It is particularly important to keep records of the use of all veterinary drugs and animal health products. These records are essential for ensuring treated animals are not sold before the ESIs and WHPs expire.

ESIs are the period following treatment when animals are unsuitable for processing for export markets.

WHPs are the period following treatment when animals are unsuitable for domestic processing.

An inventory of all chemical products detailing, quantities on hand, batch numbers and expiry dates must be kept up to date and be available at all times (using a chemical register).

Chemical storage

Chemicals must be stored in a locked, secure area in accordance with label directions. Chemicals should be storedin their original containers to prevent accidental misuse. Material SDS should be kept with the chemicals.

Chemical and container disposal

Containers and unwanted chemicals must be disposed of according to manufacturer and/or label directions. Containers should be triple rinsed or thoroughly pressure rinsed. Unwanted or out-of-date chemicals should be disposed of via approved disposal sites or collection points.

Systems should been implemented for the safety of people in the feedlot. Use the below list of possible situations or activities that a feedlot may need to prepare documented responsibilities and operational procedures for to ensure adequate safety systems are in place for the feedlot.

Guidelines

Safety systems, responsibilities and procedures should be developed around:

- contractors
- visitors
- drug and alcohol use
- aggression at work
- sexual harassment
- bullying
- equal employment opportunity
- grievance
- working alone
- feed mill and commodity handling
- manual handling
- hazardous substances
- working at heights
- confined spaces
- noise and hearing protection
- machinery operation
- chainsaw operation
- firearms and weapons
- portable electrical equipment
- motor vehicle operation
- motorcycle and ATV operation
- horse handling
- cattle handling
- feedlot pens
- cattle induction and hospital facilities
- animal welfare and animal cruelty
- PPE
- first aid
- emergency evacuation
- health
- mental health
- human disease or infection
- fatigue management
- incident and injury reporting.

2. Food safety management

2.1 Property risk assessment

Systems should be implemented at the feedlot to minimise the risk of livestock being exposed to:

- **sites that are unacceptably contaminated with persistent chemicals**
- **other potential sources of persistent chemicals**
- **sources of potentially injurious physical contaminants in meat intended for human consumption.**

To achieve this, feedlots should ensure that:

- all potentially contaminated sites and sources of potentially injurious physical contaminants in meat have been identified
- all identified sources of chemical and injurious physical contaminants are managed to restrict access of livestock to prevent exposure and contamination
- potentially exposed animals are identified and managed in a manner to minimise the risk of contamination of meat intended for human consumption in accordance with relevant legal requirements
- all potential feedlot sites are tested for contamination through soil testing.

Guidelines

Prepare the site

- undertake soil sampling and analysis on potentially contaminated soil prior to site selection.

Operating the feedlot

- ensure feedlot site and livestock grazing surrounds are not contaminated with persistent chemicals
- be vigilant in screening introduced livestock onto the property.

2.2 Safe and responsible animal treatments

Systems should be implemented at the feedlot to ensure that animal treatments are stored and administered in a safe and responsible manner to minimise the risk of chemical residues and physical hazards in livestock intended for human consumption.

To achieve this, feedlots should ensure that:

1. Animal treatments, including hormonal growth promotants (HGPs), are administered only by trained and competent people in accordance with label and/or written veterinary directions and relevant legal requirements.
2. Chemicals are stored securely in accordance with the label or manufacturers' directions to prevent exposure to livestock.
3. Sufficient records are maintained to enable the traceability of the status of treated livestock, including introduced livestock, with respect to relevant WHPs/ESIs, HGP treatment and/or presence of broken needles. This will enable the correct/controlled use of chemicals to be demonstrated.

Guidelines

Prepare employees

Key personnel should undertake accredited agricultural and veterinary chemical training.

Manage commodities

Task	Frequency of completion
• store all chemical and logbooks in locked cabinet or container.	Always
• record chemical use on feed ingredients, including date, name, DOM/expiry date, application rate, reason, WHP/ESI.	Daily
• review chemical usage and log book.	Quarterly
• reconcile inventory at end of financial year stocktake.	Annually

Livestock

Task	Frequency of completion
• store all chemicals and logbook in locked cabinet/container • store all hormone growth promotant (HGP) products in locked cabinet/container and assign responsible person(s) for this.	Always
• record chemical use on feed ingredients, including date, name, DOM/expiry date, application rate, reason, WHP/ESI • record any HGP products applied to individual livestock, including date, name, DOM/expiry date, application rate, reason, WHP/ESI • update HGP register and reconcile (start of day inventory – applied – lost/damaged + purchased = end of day inventory).	Daily
• reconcile chemical records with physical stocktake • reconcile HGP records with physical stocktake • safely dispose of any out-of-date chemicals or HGPs.	Weekly
• reconcile inventory at end of financial year stocktake.	Annually

People

Each quarter, you should:

- review training requirements for people handling and administering chemicals
- update training log.

2.3 Fodder crop, grain and pasture treatments and stock foods

Feed and fodder declarations are important tools in ensuring that feed ingredients purchased by a feedlot are fit for purpose and are free of potentially dangerous chemical residues, toxins or contaminants. The feedlot should always request the relevant vendor declaration from their supplier.

Grain, fodder and by-product declarations received by feedlots are a valuable component of risk assessment and record keeping. Accurate and detailed records are vital to substantiating claims made on an LPA NVD and Waybill and may be checked under the random audit process of the LPA program or the annual NFAS audit.

Feedlots should implement systems to manage the exposure of livestock to foods containing unacceptable chemical contamination. These are necessary to minimise the risk of chemical residues in livestock, and to eliminate the risk of animal products being fed to ruminant livestock intended for human consumption.

To achieve this, feedlots should ensure that:

1. Agricultural chemicals are applied to fodder crops, grains and pastures only by trained and competent staff in accordance with label directions or relevant approvals in accordance with relevant legal requirements.
2. Chemicals are stored securely in accordance with label or manufacturer's directions to prevent exposure to livestock.
3. Exposure of animals to fodder crops, grains, pastures and introduced stock feed that have been treated with or exposed to agricultural chemicals is managed to minimise the risk of unacceptable chemical residues in livestock for human consumption.
4. Sufficient records are maintained to enable the traceability of the status of exposed livestock, including introduced livestock, with respect to relevant WHP/ESI.
5. Exposure of animals to stock feed is managed to eliminate the risk of animal products being fed to ruminant livestock, apart from approved exemptions.
6. A declaration of suitability must be obtained from the vendor (e.g. a Commodity Vendor Declaration) for all introduced stock feed intended to be fed to livestock.
7. Sufficient records are maintained to enable the traceability of the status of fodder crops, grains, pastures and introduced stock feed intended to be fed to livestock with respect to relevant WHP/ESI from slaughter or grazing/harvest as applicable and to enable the correct/controlled use of chemicals to be demonstrated.

Guidelines

Task	Frequency of completion
• Document purchase orders and purchase contracts for each agreed supply contract. • Review and record Commodity Vendor Declarations against each consignment/purchase order/contract. This will ensure the risk of introduced feed ingredients and stock feeds that have been treated with or exposed to agricultural chemicals or ruminant animal material (RAM) is managed to minimise unacceptable chemical residues in livestock for human consumption. • Ensure the vendor declaration is received at or prior to delivery for each ingredient or commodity delivered to the feedlot (e.g. grain, fodder, silage, by-product, molasses, liquid supplement, vegetable oil, tallow, protein meal, cotton seed).	Daily
• reconcile feed ingredient and stock feed deliveries against open and closed purchase orders/contracts.	Weekly
• reconcile feed ingredient and stock feed deliveries against open and closed purchase orders/contracts for the month's end – align with theoretical inventory and physical stocktake.	Monthly
• reconcile inventory at end of financial year stocktake.	Annually

2.4 Chemical residue risk assessments

SAFEMEAT provides a series of risk assessment documents to help livestock producers be aware of possible chemical residues when purchasing feeds for livestock.

Risk assessments have been conducted for feeds such as cereal grains, oilseed grains, cereal forage hays, as well as by-product feeds such as almond hulls and citrus pulp.

Risk assessment documents for the various feeds for livestock can be accessed at safemeat.com.au/our-system/responsible-chemical-use/residue-risk

2.5 Additive, premix and liquid supplement manufacturer accreditation

Feedlots should ensure the safety and integrity of products by sourcing and documenting all additives, premix and liquid supplement products from manufacturers which retain relevant industry accreditation such as FeedSafe, FIAAA Code of Practice/FAMI QS Certification or equivalent. This means that feedlots must ensure that:

1. Premix and liquid supplements are sourced from manufacturers which retain FeedSafe, FIAAA Code of Practice/FAMI QS Certification or equivalent accreditation.
2. All additive, premix and liquid supplements feedstuffs entering the feedlot are accompanied with a valid Stock Food Supplier Declaration Form.

Guidelines

Task	Frequency of completion
• ensure a valid Stock Food Supplier Declaration form is received at or prior to delivery for each additive, premix or liquid supplement feedstuff delivered to the feedlot.	Daily
• Review and document that all premix and liquid supplements are sourced from manufacturers which retain a FeedSafe, FIAAA Code of Practice/ FAMI QS Certification or equivalent accreditation.	Quarterly

2.6 Preparation for dispatch of livestock

Feedlots should implement systems to ensure that the selected livestock are fit for transport and that the risk of stress and contamination of livestock during assembly and transport is minimised.

To achieve this, feedlots should ensure that:

1. Only animals that are in a condition fit for travel are selected to minimise potential injury or negative welfare impacts and disease and/or contamination related to transport conditions.
2. On farm assembly practices and transport arrangements are managed to minimise the risk of stress and contamination of animals.
3. Management practices ensure that minimum requirements for the fitness for travel of calves destined for sale or slaughter are in accordance with the Declarations made on the Bobby Calf LPA NVD at all times.

Guidelines

Each day, feedlots should:

- ensure only livestock fit to travel are selected for transport
- check cattle are fit for purpose (check specifications, declarations and review WHP and ESI status)
- check cattle are fit to load and transport – if in doubt, leave them out
- ensure cattle are segregated in assembly yards/pens prior to transport
- check access to water and feed prior to dispatch
- check transport and dispatch times
- practice quiet, low stress livestock handling techniques when loading.

Reference: *Is the Animal Fit to Load* (Revised edition, September 2019, national version) (MLA)

2.7 Livestock transactions and movements

Feedlots should implement systems to ensure traceability of the current status of all livestock, with respect to treatment or exposure to relevant food safety hazards for all livestock movements between livestock production enterprises including to sale, slaughter and live export.

To achieve this, feedlots should ensure that:

1. All livestock transactions and movements including between property identification codes (PICs) are accompanied (or electronically transferred) by a current, correctly completed LPA National Vendor Declaration (NVD).
2. Records are maintained to enable the declarations on an accompanying (or electronically transferred) LPA NVD concerning the food safety related status and HGP treatment of livestock introduced to and dispatched from the property to be reconciled with the livestock traceability system adopted.
3. Livestock must be NLIS identified in accordance with relevant statutory requirements at all times.
4. The feedlot must have procedures in place to ensure that its NLIS account is reconciled at least once each year.
5. The status of livestock in regard to HGP treatments can be demonstrated by permanently identifying individual animals with a triangular ear punch and maintaining records of HGP use in individual cattle.

Guidelines

Incoming livestock

Each day, feedlots should:

- check and record number of livestock per delivered consignment – reconcile with purchase order/contract
- check and record NVD information and status of livestock per delivered consignment – reconcile with purchase order/contract and intake eligibility/acceptance
- check and record additional information (NFAS, MSA, EU, program and raising claim declarations) of livestock per delivered consignment – reconcile with purchase order/contract
- check and record non-conforming livestock – incorrect delivery or out of specification, mis-described, injured, diseased livestock
- process acceptable livestock – record individual animal information against NLIS tag and physical feedlot identifier tag (dual identification) in feedlot database, including replacement NLIS identifiers where applicable
- process acceptable livestock – record all animal health treatments for individual animals in feedlot database
- reconcile all incoming livestock documentation – weighbridge docket, sales summary, purchase order, contract, Waybill, NVD, animal health statement, program declaration – with individual animal data recorded in the feedlot database
- upload information of newly introduced cattle to NLIS database account
- notify livestock buyers, vendors, agents and suppliers of any non-conformances or unacceptable livestock and record these non-conformances.

Outgoing livestock

Each day, feedlots should:

- check status of individual cattle per consignment for delivery
- check and record number of livestock per delivered consignment – reconcile with purchase order/contract.

3. Livestock management

The Livestock Production Assurance (LPA) program is the Australian red meat industry's on-farm quality assurance program. LPA ensures on-farm management fulfils customer expectations around food safety and ethical production. LPA-accredited producers and feedlots must abide by the LPA rules and standards, including the seven program requirements outlined below.

LPA requirement	Producer or feedlot responsibility under the requirement
1. Property risk assessments	Minimise the risk of livestock being exposed to sites that are unacceptably contaminated with persistent chemicals or physical contaminants.
2. Safe and responsible animal treatments	Ensure animal treatments are administered in a safe and responsible manner that minimises the risk of chemical residues and physical hazards.
3. Stock foods, fodder crop, grain and pasture treatments	Minimise exposure of livestock to foods containing unacceptable chemical contamination and guarantee that livestock are not fed animal products.
4. Preparation for dispatch of livestock	Ensure livestock are fit for transport and to minimise the risk of stress and contamination during assembly and transport.
5. Livestock transactions and movements	To ensure animals sold are not exposed to food safety hazards and meet all traceability requirements, should a safety issue occur, livestock producers are required to: • record all livestock purchases and sales • keep copies of all LPA NVDs/eNVDs • record vendor's names, addresses and PICs • record livestock details/description • keep records of animals purchased within a WHP/ESI period • keep records of animals that may have been exposed to physical contaminants such as broken needles, buckshot or wire.
6. Biosecurity	Implement on-farm biosecurity systems (as outlined by the LPA rules and standards) to minimise the risk of infectious diseases being introduced to livestock production properties and the subsequent spread of any such diseases.
7. Animal welfare.	Ensure animal welfare requirements are fulfilled by following the *Australia Animal Welfare Standards and Guidelines for cattle*.

The LPA NVD guarantees the safety of red meat products and enables the traceability of those products along each link in the value chain. This system ensures market access and maintains the solid reputation of the industry in line with customer expectations.

The NVD is a declaration that a producer's on-farm practices meet LPA requirements and therefore the expectations of customers and stakeholders in the value chain.

The NVD connects the two key elements of the integrity system - on-farm assurance (delivered through the LPA program) and livestock traceability (delivered through the NLIS). These programs work together to create an integrity system that underpins our livestock selling system and ensures buyers, retailers and consumers have confidence in Australian red meat.

3.1 Livestock identification

A livestock identification system should be implemented on the property and/or feedlot that enables maintenance of appropriate management records, traceability of stock on the property and/or feedlot and when dispatched from the property and/or feedlot. This system should ensure the integrity of product described as Grain Fed and prevent contaminated or treated animals unknowingly being sold for human consumption prior to expiry of the WHP or ESI.

To achieve this, feedlots should ensure that:

1. A stock identification system has been established which:

- complies with the National Livestock Identification Scheme (NLIS)
- in addition to the NLIS identifier includes some permanent visual method of identifying individual cattle from the time of receival/induction while they are at the feedlot and during transit to an abattoir, saleyard or other property, enabling traceability at all times.

2. Feedlot records pertaining to cattle entry, identification and exit allow the calculation of the number of days on feed (DOF).
3. Feedlot record maintenance systems ensure contaminated animals are not unknowingly sold for human consumption.
4. Introduced cattle are identified within seven days of arrival onto the feedlot.

Guidelines

Task	Frequency of completion
• record all NLIS devices on cattle as soon as practical • identify individual cattle with a second (to NLIS device) permanent visual method to ensure cattle can be identified throughout the feeding period and delivery to final destination • record both NLIS device and second permanent visual method against each individual animal • record all animal health treatments and products given to each individual animal • record details of previous vendor/ property for each individual animal • where NLIS devices are unreadable or missing, tag cattle with feedlot property identification code (PIC) orange NLIS devices and record.	At delivery or induction of livestock
• record the commencement date into the feeding program • reconcile induction records against delivery/purchase orders for each mob • reconcile cattle numbers with delivery/ purchase orders and LPA National Vendor Declaration, Animal Health Declarations/Statements, Auction/ Sales reports or other delivery documentation (NFAS Delivery Docket – cattle from another feedlot) • reconcile cattle numbers and NLIS devices with delivery/purchase information • update NLIS database • identify any cattle administered health products in the health log/ database – using NLIS device and second permanent visual method (and an additional 'hospital' tag where required) • record all animal health treatments administered to cattle during the feeding period prior to exiting the feedlot (include product name, batch number, date of manufacture/expiry, WHP, ESI, date of administration, person administering the treatment) • where NLIS devices are unreadable or missing, tag cattle with feedlot property identification code (PIC) orange NLIS devices and record.	As required

3.2 Livestock husbandry and presentation

Feedlots should implement systems to ensure livestock are presented for sale or slaughter in a manner that minimises stress to cattle and limits any damage to carcase, hide and skin quality attributes.

To achieve this, feedlots should ensure that:

1. Livestock husbandry and management practices minimise the risk of bruising, hide and skin damage with consideration to husbandry practices such as horn length, vaccination sites and brand application.
2. Feedlot pens and associated yards and loading facilities are constructed and maintained in a manner so as to minimise bruising and injury.

Guidelines

Pen management

Task	Frequency of completion
• remove feed residue from feed bunks.	Daily
• remove spilt feed from roadways • formulate pen management plans – maintenance, manure loads, cleaning opportunities • repair pen floor potholes and eliminate wet patches • review hospital and recovery pen bedding.	Weekly
• conduct under fence cleaning.	Monthly
• conduct pen cleaning and review pens with bedding – keep in mind pen cleaning in autumn and winter may be of a higher frequency • pen clean in a manner which ensures the design slopes and integrity of the pen floor are maintained – box scraper and laser level, RTK GPS mapping.	Every two months

Remember: pen management is the key to good amenity and livestock conditions.

Drinking water

Task	Frequency of completion
• check water troughs and float valves – clean where required • check water storage facilities • monitor water reticulation system e.g. pumps, pipelines.	Daily
• clean water troughs to ensure fresh, clean drinking water.	Weekly

Remember: fresh drinking water is important to maintain livestock health and performance.

Receiving cattle

- conduct an inspection on arrival to check cattle for lameness, injury, illness and disease and record this inspection
- ensure new cattle have access to sufficient area to lie down
- ensure new cattle have immediate access to clean drinking water, hay and feed.

Remember: rehydration and restoring rumen function are crucial to an animal's recovery from transport.

Livestock management

Task	Frequency of completion
• practice good handling techniques for good health and productivity • minimise time off water and feed when undertaking tasks • practice quiet, low stress livestock handling techniques, including: a. limit use of electric prodders and poly goads b. limit yelling/screaming when working livestock c. prevent slips and trips by livestock – reduce pressure when handling • ensure the needs of livestock are being met, including: a. nutritional – water and feed b. environmental – comfortable resting area and shelter c. health – prevent disease, injury or functional impairment d. behavioural – interaction, socialise, rumination e. mental or cognitive – prevent thirst, hunger, pain, fear, anxiety, weakness, sickness and distress.	Daily
• monitor loading and unloading ramps – maintenance check • monitor lairage pens – holding cattle in/out – maintenance check.	Weekly
• internal audit of animal welfare practices by the feedlot's certified Animal Welfare Officer (AWO).	Monthly
• external audit of animal welfare practices by a consultant veterinarian.	Quarterly

Remember: good welfare means animals are fit and feeling well.

Dispatching cattle

Whenever dispatching cattle, feedlots should:

- check cattle are fit for purpose – review WHP and ESI status, ensure they meet specifications and declarations
- check cattle are fit to load and transport – if in doubt, leave them out
- when loading, practice quiet, low stress livestock handling techniques
- when loading, ensure the correct density for the type of cattle (trade, export or long fed).

Remember: quiet handling and well maintained facilities are crucial to minimising stress on cattle.

Intensive backgrounding

Each day, feedlots should:

- monitor cattle in paddocks – check their health status and record movements, treatments, mortalities
- monitor water points and clean as required
- monitor feed requirements and access.

References:

Australian Animal Welfare Standards and Guidelines for Cattle

Australian Animal Welfare Standards and Guidelines - Land Transport of Livestock

Is the Animal Fit to Load (Revised edition September 2019 National Version) (MLA)

3.3 Livestock transport

Feedlots should implement systems to maximise the welfare of cattle and minimise the risk of injury, bruising, hide and skin damage during transportation.

To achieve this, feedlots should ensure that:

1. A person in charge exercises their duty of care to ensure the welfare of livestock under their control and compliance with the *Australian Animal Welfare Standards and Guidelines – Land Transport of Livestock.* The consignor is responsible for livestock welfare during:

- mustering, assembling and handling of livestock
- preparation of cattle, including selection as fit for the intended journey, are in accordance with MLA's *Fit to Load* guide . An animal is not fit for a journey if it is:
    a. unable to walk on its own by bearing weight on all legs
    b. severely emaciated
    c. visibly dehydrated
    d. showing visible signs of serve injury or distress
    e. suffering from conditions that are likely to cause increased pain or distress during transport
    f. blind in both eyes
    g. known to be, or visually assessed to be within two weeks of parturition, unless the water deprivation time and journey is less than four hours duration to another property.
- feed and water provision
- holding periods before loading.

2. Stock crates utilised for transporting livestock are designed and maintained to prevent injury and bruising to livestock during loading, unloading and transport activities. Trucks used for transporting feedlot cattle are:

- maintained to be free of sharp edges or projections capable of injuring animals
- designed so that side rails prevent cattle from placing their head or legs between the rails
- maintained so that the floor provides traction without holes large enough to injure hooves or legs
- designed so that hinges and latches of float gates/ gateways do not project into the path of animals
- designed so that deck-height of multi-deck floats is sufficient to allow animals to stand upright without contacting overhead structures
- designed so that the construction of upper decks minimises soiling of animals on lower decks
- the float and deck is as clean as practicable before loading.

3. Livestock transport operators utilised by an enterprise are competent and comply with relevant legislation and industry codes of practice.
4. Livestock loading densities, food and water allowances and rest stops (including visual inspections) are appropriate for the type and class of animal being transported, seasonal conditions and required transport journey.

Time off water must not exceed 48 hours for cattle over six months old.

All complaints in relation to bruising and hide damage received from purchasers or processors are documented and investigated, then appropriate corrective and preventive action taken and documented.

Guidelines

Receiving cattle

- on arrival, check cattle for lameness, injury, illness and disease and record this inspection
- ensure new cattle have access to sufficient area to lie down
- ensure new cattle have immediate access to clean drinking water and hay.

Remember: rehydration and restoring rumen function are crucial to an animal's recovery from transport

Dispatching cattle

Whenever dispatching cattle, feedlots should:

- check stock crate is suitable for transporting cattle (clean, obtrusions, bedding)
- check cattle are fit for purpose –review WHP and ESI status and ensure they meet specifications and requirements of declarations
- check cattle are fit to load and transport – if in doubt, leave them out
- check transport and dispatch times
- when loading, practice quiet, low stress livestock handling techniques
- when loading, ensure the correct density for the type of cattle (trade, export or long fed)

Remember: quiet handling and well maintained facilities are crucial to minimising stress on cattle.

References:

Australian Animal Welfare Standards & Guidelines – Land Transport of Livestock

Is the Animal Fit to Load (Revised edition September 2019 National Version) (MLA)

3.4 Livestock health

Feedlots should implement systems to ensure the health of livestock is routinely monitored and maintained whilst within the control of persons responsible for their care and well-being.

Sickness results from a complex interaction between animal, agent (bacterium, virus or toxin) and environment (weather, management or diet). When all three are balanced, the animal can remain healthy, even in the presence of bacteria, viruses or toxins. When factors alter the characteristics of the animal, agent and environment, the balance can be upset and result in disease.

Health management program

A health management program is a plan which sets out the overall strategy as well as specific procedures for maintaining livestock in good health. Health programs need to address both clinical disease (where effects on the animal are readily observable) and subclinical disease (where symptoms are not readily observable but there are production losses and or welfare issues). An integrated approach considers all possible options for preventing disease and balances monitoring, vaccination and biosecurity measures.

Training

Livestock owners are responsible for ensuring that people who monitor livestock and perform livestock health procedures are trained and have relevant knowledge, experience and skills. People learning to monitor livestock and undertake health procedures should be directly supervised by a person with relevant knowledge, experience and skills.

Recognising disease

Being familiar with what is 'normal' in livestock will mean you are better able to recognise anything that is 'abnormal' and respond appropriately and promptly.

Monitoring livestock

Livestock should be monitored frequently to ensure that their dietary requirements are being met through provision of adequate feed and water. Livestock should also be monitored frequently to ensure that they are in good health and free of disease and injury.

Responding to health issues

Investigate all animal deaths where practical. When large numbers of animals are affected in a very short time, the most common cause is toxicity. If an uncommon or unexplained health problem occurs, seek professional advice from the local or consultant veterinarian or state department of agriculture.

Reporting notifiable diseases

Notifiable diseases are diseases (endemic or exotic) that by law must be reported to government veterinary services. A notifiable disease could be a disease which is not normally found in the region (e.g. botulism, cattle tick or Hendra virus) or it could be an exotic disease (e.g. foot and mouth disease). If something unusual is detected and the consultant veterinarian or state department of agriculture is unable to be contacted, it can be directly reported to the 24-hour Emergency Animal Disease Watch Hotline on free call 1800 675 888. Early action could make all the difference.

Vaccination

Vaccinations can prevent many common diseases in feedlot cattle. Vaccination strategies should be based on the welfare of the animal, production benefits and whether vaccination can reduce disease incidence in susceptible cattle and also reduce zoonotic disease risks for people handling livestock.

Zoonosis risks

Zoonoses are infections naturally transmissible between animals and humans. Common disease risks for humans include leptospirosis and Q fever. Assess the risk of people contracting a zoonotic disease from livestock. Risks should be managed where practical by using strategies to reduce the risk of disease transmission to humans. The management system may include:

- human vaccinations (e.g. Q fever)
- livestock vaccinations (e.g. leptospirosis)
- strategies to reduce human exposure to animal diseases.

Keeping records

Good record keeping is integral to managing animal health. Feedlot records can provide crucial information when diseases are investigated and analysing animal performance data. Develop a routine practice of recording details of incoming cattle, feedlot movements, health treatments, dispatched cattle, deaths, diseased livestock and poor performance. It is important to record specific details when individual cattle are treated with products that have defined WHP and ESI.

Guidelines

Task	Frequency of completion
• monitor all cattle in the feedlot • remove sick, unwell or injured cattle from production pens to a hospital area for further assessment • assess sick, unwell or injured cattle and provide animal health treatment as required • record all animal health treatments administered to individual cattle (include product name, batch number, date of manufacture/expiry, WHP, ESI, date of administration, person administering the treatment) • consider the following criteria in making the decision to euthanise compromised cattle – possibility of recovery, available effective treatment, fit for transport, not fit for slaughter, agitated and/or dangerous or disease investigation • consider conducting post-mortem for disease surveillance and/or cause of illness.	Daily
• review contact details for consultant nutritionist and veterinarian and update as required.	Monthly
• review animal health treatment protocols with consultant veterinarian and document changes • provide training update for livestock handlers on review of treatment protocols • review feedlot antimicrobial stewardship program in conjunction with consultant veterinarian – reduce, refine, replace.	Quarterly

Intensive backgrounding management

Each day, feedlots should:

- monitor cattle in paddocks – check health status of livestock and record movements, treatments, mortalities
- monitor water points and clean as required
- monitor feed requirements and access (feeders, racks, bunks).

References:

Antimicrobial stewardship guidelines for the Australian cattle feedlot industry (ALFA/MLA)

3.5 Antimicrobial stewardship

Feedlots should implement systems that promote a continuous improvement framework to ensure the appropriate use of antimicrobials, preserving their effectiveness whilst protecting human and animal health.

To achieve this, feedlots should ensure that:

1. Appropriate procedures have been implemented to address judicious use of animal health chemicals in accordance with the principles of the industry's Antimicrobial Stewardship Guidelines, including:

- **Responsibility** – ensure everyone at the feedlot, including the consulting veterinarian, nutritionist, feedlot management and staff and stock feed manufacturers recognise the need to preserve the effectiveness of antimicrobials. Antimicrobial stewardship should become a priority through the formation of a management team that is responsible for developing and implementing an antimicrobial stewardship plan for the feedlot.
- **Review** – regularly review and evaluate compliance with the feedlot antimicrobial stewardship plan and adopt a process of continuous improvement to ensure that antimicrobial use practices reflect contemporary best practice.
- **Reduce** – wherever possible, adopt preventative measures to reduce the need for medically important antimicrobials without compromising the health and wellbeing of the animals in the feedlot.
- **Refine** – refine and continually improve the antimicrobial stewardship plan by ensuring the correct antimicrobial is used for the correct disease diagnosis and that the antimicrobial is administered correctly (dose, route of administration, duration) at the correct time. Monitoring these practices over time will help make improvements in treatment protocols and antimicrobial use patterns, and demonstrate best practice standards to stakeholders, trading partners and consumers.
- **Replace** – consider replacement of a medically important antimicrobial whenever available evidence supports the efficacy and safety of an alternative without compromising the health and wellbeing of the animals in the feedlot.

2. The feedlot has a register of veterinary medicines (prescribed drug list) developed in consultation with a veterinarian.
3. The feedlot has documented health treatment protocols in consultation with a veterinarian.
4. The feedlot has developed and implemented an antimicrobial stewardship plan which:

- meets federal, state and local government legislative requirements surrounding veterinary medicine use, storage and disposal
- includes roles and responsibilities of those accountable for antimicrobial stewardship including the consulting veterinarian
- demonstrates that feedlot staff have been adequately trained in the management, use and application of antimicrobials
- outlines an internal review mechanism of the Antimicrobial Stewardship Plan conducted by the feedlot's consulting veterinarian, taking into consideration that:
    a. feedlots over 10,000 head are required to conduct a review every six months
    b. feedlots under 10,000 head are required to conduct a review every 12 months
- includes a documented biannual review of the animal health treatment protocol which is signed off by the feedlot's consulting veterinarian and feedlot owner/manager
- includes a register of antimicrobials used within the feedlot which are listed as highly important to human health by ASTAG
- ensures accurate record keeping of antimicrobial use on all cattle.

Guidelines

Task	Frequency of completion
• ensure that only veterinary products that are on the prescribed drug list are administered, according to the documented treatment protocol • record each animal's treatment program – product, dose rate, frequency of dose, route of administration • record applicable WHPs and ESIs for the products used • adhere to any applicable special directions for products with label restraints or off label use • consider conducting post-mortem for disease surveillance and/or cause of illness and antimicrobial resistance surveillance (treatment efficacy) – samples, laboratory analysis.	Daily
• review the current status of animal health, wellbeing and antimicrobial use with the consultant veterinarian – evaluate efficacy of the treatment protocols • review opportunities to change practices and methods with the consultant veterinarian • review the prescribed drug list and treatment protocols with the consultant veterinarian.	Quarterly

Remember: use antimicrobials judiciously and review the program regularly.

Reference: *Antimicrobial stewardship guidelines for the Australian cattle feedlot industry* (ALFA/MLA)

3.6 Livestock welfare

The welfare of livestock is paramount to their health, productive capacity and ultimately the profitability of the enterprise.

Australian Animal Welfare Standards and Guidelines for Cattle

The Australian Animal Welfare Standards and Guidelines for Cattle provide a basis for developing and implementing consistent legislation (the Standards) and provide guidance (the Guidelines) to all people responsible for livestock.

Sick or injured livestock

All persons responsible for livestock must provide appropriate care and treatment (which may include euthanasia) to sick, injured or diseased livestock at the earliest practical opportunity to ensure animals suffer for the least time possible.

Feed and water

Cattle must have access to feed and water to minimise risks to their welfare. Matching stocking rates to pen size and available feed is a critical factor in maintaining appropriate body condition for good production and welfare. Introduce major changes in diet gradually and closely monitor animals. Identify shy feeders and manage them to achieve required feed intake.

Facilities and equipment

Facilities and equipment need to be designed, maintained and used to minimise risks to cattle welfare.

Livestock handling

Handle cattle quietly and calmly, taking into account their flight zone and natural mobbing instinct, so as to minimise stress during handling. Make allowances for livestock with special needs such as young livestock, lame stock and long hauled cattle. Where practical, livestock should not be handled when environmental conditions are unfavourable (e.g. extreme heat or boggy conditions).

Husbandry procedures

Surgical husbandry procedures should be conducted only in a manner that minimises the risk to livestock welfare, particularly pain and stress. Pain relief should be provided. Use effective but not excessive restraint to minimise movement and to enable the procedure to be done quickly and efficiently.

Staff training

Feedlot operators and managers are responsible for ensuring that people who handle livestock and perform husbandry procedures have the necessary knowledge, skills and experience. People learning to handle livestock and undertake husbandry procedures should be directly supervised by a person with the relevant knowledge, skills and experience so as to meet regulatory requirements and in a manner that minimises the risks to animal welfare.

Humane destruction

When it is necessary to euthanase livestock this must be done promptly, safely and humanely. Close range firearms or captive bolt to the brain are recommended humane destruction methods for both adult cattle and calves (see the Euthanasia of Feedlot Cattle Handbook).

Livestock transport

From an animal welfare perspective, transport management commences before the journey begins and ends after the journey is complete, with the pre-transport phase being critical to success. Any person in charge of livestock at any time carries a duty of care or responsibility for the welfare of the livestock. They are expected to take reasonable action to minimise risks.

Australian Animal Welfare Standards and Guidelines - Land Transport of Livestock

The Australian Animal Welfare Standards and Guidelines - Land Transport of Livestock provide a basis for developing and implementing consistent legislation (the Standards) and providing guidance (the Guidelines) for all people responsible for livestock transport.

Livestock transport responsibilities

All people involved in transporting cattle share responsibility for minimising risk factors. Livestock can be transported more effectively and with lower risk to welfare if the following principles are addressed:

- livestock transport planning
- livestock handling competency
- livestock transport vehicles and facilities
- pre-transport selection and handling
- time off water and feed
- humane destruction.

Feedlots should implement systems to ensure the welfare of livestock is not compromised whilst within the control of persons responsible for their care and well-being and that prompt and appropriate remedial action is taken when required.

To achieve this, feedlots should ensure that:

1. Appropriate procedures have been implemented to address animal welfare at the feedlot in accordance with the *Australian Animal Welfare Standards and Guidelines for Cattle*.
2. The feedlot can demonstrate optimisation of feeder cattle comfort and permits the display of normal behaviour through the implementation of shade in all feedlot hospital and production pens.
3. Pens regularly used for hospital purposes are clearly identified within the feedlot.
4. Stocking of hospital pens is managed within the feedlot's allowable stocking density on an individual pen basis.
5. A person in charge must ensure the cleaning of feed pens and maintenance of surfaces on a planned basis to ensure that pen surfaces can drain freely.
6. Appropriate procedures have been implemented to address animal welfare at the feedlot in accordance with the *Australian Animal Welfare Standards and Guidelines – Land Transport of Livestock*.
7. The person responsible communicates with the designated transport company or driver to provide effective instructions on the practices and arrangements for unloading and managing livestock if cattle are delivered out of hours.
8. Euthanasia of cattle should be undertaken by a competent person or under direct supervision of a competent person, using a recommended method for the species and at the first opportunity.
9. In cases that may be considered to be an animal welfare emergency (i.e. a natural disaster such as flooding, cyclone, earthquake, prolonged loss of power or an unavoidable inability to access components of a feed ration), an accredited feedlot may request approval from FLIAC to take specified cattle off a prescribed feed ration for a period no longer than seven days and maintain eligibility for the initial feeding period to be counted in the eligibility of the cattle to be described as GF, GFYG or GFF (as applicable) when feeding resumes.
10. If a feedlot feeds female cattle, a pregnancy and calving management plan has been documented and implemented in order to manage the welfare of cows/heifers and calves.
11. Procedures are in place to record, investigate and manage any incidents of animal cruelty.

Guidelines

Animal welfare audits

Task	Frequency of completion
• internal audit of animal welfare practices is conducted by a certified Animal Welfare Officer (AWO).	Monthly
• external audit of animal welfare practices is conducted by a consultant veterinarian.	Quarterly

Remember: internal and external audits promote continuous improvement.

Pen management

Task	Frequency of completion
• remove feed residue from feed bunks daily.	Daily
• remove spilt feed from roadways or more frequently if required • formulate pen management plans – maintenance, manure loads, cleaning opportunities • repair pen floor potholes and eliminate wet patches.	Weekly
• conduct under fence cleaning (more frequently if required).	Monthly
• conduct pen cleaning (at least every 9-12 weeks) and review pens with bedding • clean pen in a manner which ensures the design slopes and integrity of the pen floor are maintained (i.e. optimal pad depth 50mm - keep pen surface compacted manure layer 50–100mm max)	Every 2 months

Remember: pen management is the key to good amenity and livestock conditions.

Drinking water

Task	Frequency of completion
• check water troughs and float valves, clean where required • check water storage facilities • monitor water reticulation system e.g. pumps, pipelines.	Daily
• clean water troughs to ensure fresh, clean drinking water.	Weekly

Remember: fresh drinking water is important to maintain livestock health and performance.

Livestock management

Task	Frequency of completion
• practice good handling techniques for good health and productivity • minimise time off water and feed when undertaking tasks • practice quiet, low stress livestock handling techniques, including: a. limit use of electric prodders and poly goads b. limit yelling/screaming when working livestock c. prevent slips and trips by livestock – reduce pressure when handling • ensure the needs of livestock are being met, including: a. nutritional – water and feed b. environmental – comfortable resting area and shelter c. health – prevent disease, injury or functional impairment d. behavioural – interaction, socialise, rumination e. mental or cognitive – prevent thirst, hunger, pain, fear, anxiety, weakness, sickness and distress.	Daily
• monitor loading and unloading ramps – maintenance check • monitor lairage pens – holding cattle in/out – maintenance check.	Weekly
• internal audit of animal welfare practices is conducted by the feedlot's certified AWO.	Monthly
• external audit of animal welfare practices is conducted by a consultant veterinarian.	Quarterly

Remember: good welfare means the animals are fit and feeling well.

Receiving cattle

- on arrival, check cattle for lameness, illness or disease and record observations
- ensure new cattle have access to sufficient area to lie down
- ensure new cattle have immediate access to clean drinking water, hay and feed.

Remember: rehydration and restoring rumen function are crucial to an animal's recovery from transport

Dispatching cattle

Whenever dispatching cattle, feedlots should:

- check stock crate is suitable for transporting cattle (clean, obtrusions, bedding)
- check cattle are fit for purpose –review WHP and ESI status and ensure they meet specifications and declarations
- check cattle are fit to load and transport – if in doubt, leave them out
- check transport and dispatch times
- when loading, practice quiet, low stress livestock handling techniques
- when loading, ensure the correct density for the type of cattle (trade, export or long fed)

Remember: quiet handling and well maintained facilities are crucial to minimising stress on cattle.

Hospital management

Task	Frequency of completion
• conduct an assessment of animals (decide which animals are for treatment, salvage slaughter, recovery paddock or euthanasia) • decide on animals to euthanise – make a calculated and confident call early to minimise suffering • consider conducting a post-mortem for disease surveillance and/or cause of illness • monitor hay racks and refresh as required • check water troughs and float valves are clean • review stocking density in hospital treatment pens • during excessive hot weather and prolonged wet weather, apply proactive criteria to minimise cattle suffering • ensure needles are disposed of in containers, rubbish collected to bins, rubbish removed from livestock handling area • ensure all animal health products are stored and secured • ensure the feedlot AWO signs off on the completion of the day's activities.	Daily
• review bedding.	Monthly

Remember: the priority is to maximise health improvements in livestock and minimise suffering.

Pregnant heifers and calves

Task	Frequency of completion
• all incoming female cattle assessed for pregnancy status – on-farm/sale/on-feedlot • implement pregnancy and calving management plan – abort, cull or return to vendor • calves removed from production feeding pens • slinks (or premature calves) should be removed immediately on identification from pens.	Daily
• review pregnancy and calving management plan with consultant veterinarian.	Quarterly

Remember: the priority is to limit the birthing of calves in the feedlot in the first instance, and then to manage the welfare of those born in the most practical way outside the feedlot.

Mortalities

Task	Frequency of completion
• dead stock are removed immediately on identification from pens to carcase disposal area • cattle that have been euthanised are transferred immediately to the carcase disposal area • carcases transported in most discreet method possible – front-end loader bucket/tipping truck • all carcases are buried or covered over in decomposition site on delivery to the disposal area.	Daily
• monitor carcase disposal area – ensure carcases and bones are fully covered.	Weekly
• review carcase disposal area site – e.g. location, discreet site, proximity to feedlot/roadways.	Annual

Remember: the priority is to limit the time deceased cattle are observable in the feedlot.

Euthanasia

Each day, feedlots should:

- decide on animals to euthanise – make a calculated and confident call early to minimise suffering
- consider criteria in the decision to euthanise compromised cattle – possibility of recovery, available effective treatment, fit for transport, not fit for slaughter, agitated and/or dangerous or disease investigation (refer to the Euthanasia of Feedlot Cattle Guidelines)
- consider conducting post mortem for disease surveillance and/or cause of illness.

Remember: animal carers have ethical and legal obligations to make early, sound decisions on which cattle require euthanasia versus those that can be sent for salvage slaughter, treated and monitored in the feedlot health and hospital system or put to pasture.

Recovery paddocks

Task	Frequency of completion
• assessment of cattle unfit for feedlot production transferred to paddock.	Daily
• assessment of cattle not displaying signs of improved health – make proactive decisions to prevent prolonged suffering • AWO signs off at completion of week's activities.	Weekly
• assessment of cattle for salvage slaughter – direct to works only.	Monthly

Remember: the priority is to prevent suffering.

Shade or shelter

In summer, shade can mitigate excessive heat load in feedlot cattle. During excessive conditions in summer, shelter is a primary need for susceptible livestock.

Each year, feedlots should also:

- undertake an audit of shade infrastructure and repair wear and tear
- undertake a risk assessment for excessive heat load events and plan solutions to enhance animal welfare and mitigate against poor outcomes (shade to be supplied for at risk categories of cattle or cattle types assessed to be susceptible without shade during summer removed from the feedlot).

Remember: the priority is to ensure cattle can be protected in periods of extreme hot weather.

Intensive backgrounding paddocks

Each day, feedlots should:

- monitor cattle welfare – injury, hazards (wire, old machinery, fallen limbs)
- monitor cattle in paddocks – check the health status of livestock and record movements, treatments, mortalities
- monitor water points and clean as required
- monitor feed requirements and access (feeders, racks, bunks).

References:

Australian Animal Welfare Standards and Guidelines for Cattle

Australian Animal Welfare Standards and Guidelines - Land Transport of Livestock

Euthanasia of Feedlot Cattle Handbook

3.7 Excessive heat load

Feedlots should implement systems to ensure the likelihood of an excessive heat load (EHL) event is monitored, and prompt and appropriate remedial action is taken when required.

To achieve this, feedlots should ensure that:

1. The feedlot can demonstrate the ability and resources to:

- calculate and monitor the heat load index (HLI) and accumulated heat load units (AHLU)
- conduct an assessment in the Risk Analysis Program (RAP) for the various classes of cattle in the feedlot.

2. The feedlot has conducted a risk assessment addressing the heat stress risk at the feedlot site.
3. The risk assessment has been documented and addresses the following criteria:

- site climatic factors for the feedlot location
- animal factors including genotype, coat colour, days on feed (DOF) and health status
- management factors which include the provision of shade, provision of additional water troughs, water temperature, ration type, bedding and manure management practices.

4. Each category of livestock has been considered in the risk assessment.
5. The risk assessment is reviewed prior to each summer and at least once per annum.
6. Management practices are implemented to mitigate the excessive heat load risks identified.
7. Appropriate documented procedures for managing the welfare of the animals at the feedlot during periods of excessive heat load risks are completed.
8. An Excessive Heat Load (EHL) Action Plan has been documented and includes the:

- name of the feedlot
- name and contact details of the person responsible at the feedlot
- name and contact details of consulting veterinarian and nutritionist
- allocation of responsibilities to relevant personnel
- threshold of activation for the EHL Action Plan
- actions to manage the excessive heat load event and the welfare of animals at the time which includes:

    a. monitoring of livestock, weather conditions, pen conditions, water and feed
    b. operational practices to be implemented for the management of livestock, pens, feed, water and personnel
    c. maintaining records of daily activities and actions taken where indicated.

Guidelines

Pen management

Every two months, feedlots should:

- conduct pen cleaning –review pens with bedding and remove excess manure load prior to peak summer weather
- clean pen in a manner which ensures the design slopes and integrity of the pen floor are maintained – box scraper and laser level, RTK GPS mapping.

Remember: pen management is the key to good amenity and livestock conditions.

Drinking water

Each day, feedlots should:

- check water troughs and float valves – clean where required
- check water storage facilities
- monitor water reticulation system e.g. pumps, pipelines
- during excessive heat load events consider cleaning water troughs more frequently to ensure fresh, clean drinking water.

Remember: fresh drinking water is important to maintain livestock health and performance.

Livestock management

Each day, feedlots should:

- monitor livestock prior, during and after excessive heat load events at least three times per day (morning, noon and afternoon) – record behaviours
- monitor feed intakes closely during and after excessive heat load events
- minimise or restrict livestock movements as required
- monitor feedlot staff for personal welfare.

Hospital management

Each day during periods of excessive hot weather and prolonged wet weather, apply proactive criteria to minimise cattle suffering

Remember: the priority is to maximise health improvements in livestock and minimise suffering.

Mortalities

Feedlots should always:

- remove dead stock immediately on identification from pens to post mortem or carcase disposal area
- ensure all carcases are buried or covered over in decomposition site on delivery to the disposal area.

Remember: the priority is to limit the time deceased cattle are observable in the feedlot.

Euthanasia

Feedlots should always:

- decide on animals to euthanise with a calculated and confident call early to minimise suffering
- consider the following criteria in the decision to euthanise compromised cattle – possibility of recovery, available effective treatment, fit for transport, not fit for slaughter, agitated and/or dangerous and disease investigation (referring to the Euthanasia of Feedlot Cattle Guidelines for more information).

Remember: animal carers have ethical and legal obligations to make early, sound decisions on which cattle require euthanasia versus those that can be put to pasture, sent to salvage slaughter, or treated and monitored in the feedlot health and hospital system.

Recovery paddocks

Each day, feedlots should make an assessment of cattle unfit for feedlot production that have been transferred to the recovery paddock(s).

Remember: the priority is to prevent suffering.

Shade

Each year, feedlots should:

- undertake an audit of shade infrastructure, repairing any wear and tear
- undertake a risk assessment for excessive heat load events and plan solutions to enhance animal welfare and mitigate against poor outcomes (shade to be supplied for at risk categories of cattle or cattle types assessed to be susceptible without shade during summer removed from the feedlot).

Remember: the priority is to ensure cattle can be protected in periods of extreme hot weather.

Contingency plan

Each year, feedlots should:

- review the feedlot EHL Action Plan and refine as required
- review Cattle Heat Load Toolbox (CHLT) and RAP prior to each summer
- review the local government requirements/permissions for the mass disposal of dead livestock and the feedlot contingency plan for mass mortalities (site, local authority).

Intensive backgrounding paddock

- monitor cattle in paddocks each day during periods of excessive heat load – record observations
- monitor water points and clean as required, increasing surveillance during periods of hot weather.

Incident reporting

Each day, feedlots should ensure incident reporting requirements are undertaken when an unusual number of deaths occur during an excessive heat load event.

3.8 Biosecurity

Biosecurity means protecting animals by preventing disease and biological agents from entering the feedlot or property, or by immediately containing them if they are found on the feedlot or property.

Exotic diseases are far less likely to occur but have the potential to damage the livestock industry economically and socially. Producers need to be aware of unusual clinical signs that may indicate an exotic disease and of how these diseases could inadvertently enter the country.

Feedlots should develop a biosecurity plan and a working relationship with the consultant veterinarian to be prepared for emergencies.

Feedlots should implement systems to ensure the likelihood of disease entry into – and spread from the feedlot and associated utilisation area – is minimised.

To achieve this, feedlots should ensure that:

1. The feedlot has conducted a risk assessment addressing the biosecurity risk at the feedlot site and formulated a Biosecurity Management Plan.
2. Staff are aware of and understand the mechanisms of the spread of disease including the potential for the introduction and transmission of diseases by livestock, feedstuffs, visitors, employees, vehicles, machinery, equipment, feral animals, wildlife, manure and effluent.
3. Routes used by all incoming and outgoing vehicles, machinery and equipment are designed to minimise entry and spread of disease. Movements should be controlled and movements outside designated access areas are minimised at all times.
4. All visitors (including contractors) entering the feedlot are assessed for their biosecurity risk prior to being granted access to the feedlot complex and surrounds. The risk assessment must consider the potential for visitors to have been previously exposed to a disease and the subsequent potential for them to introduce a disease into the feedlot.
5. A register of visitors to the feedlot (including contractors) is maintained which includes records of:
    - date, name, company, contact number, time in, time out
    - biosecurity risk assessment.
6. All cattle are inspected on arrival at the feedlot to assess the animal health status and ensure that a record of inspection is maintained.
7. All cattle in the feedlot are routinely monitored and records maintained as part of a health management program.
8. Procedures are in place to ensure stockfeed is not contaminated by equipment and machinery utilised for multiple activities such as the handling of stockfeed, manure and dead stock.
9. People involved in the daily monitoring of livestock health are trained in the early detection of livestock diseases and are aware of and understand their key responsibilities within the feedlot's Emergency Animal Disease (EAD) action plan.
10. An EAD action plan is documented and describes the activities and management practices that are to be undertaken by the feedlot in the event of a suspected emergency animal disease outbreak. Where an EAD action plan is invoked to address deaths or illnesses caused by an emergency or infectious disease, follow the procedures set out in the *AUSVETPLAN Enterprise Manual – Feedlots, Version 5 2021* (as amended or superseded).

Guidelines

Prepare

Each year, feedlots should:

- review the feedlot biosecurity management plan and assess risk in each phase of the operation
- review the Feedlot EAD action plan, following the procedures set out in the *AUSVETPLAN Enterprise Manual – Feedlots, Version 5 2021* (as amended or superseded).

Cattle

Each day, feedlots should:

- inspect new cattle on arrival and record details
- ensure all purchased/consigned cattle are accompanied by an NVD and Animal Health Statement (as required) at delivery
- record all NLIS devices on consigned cattle and transfer to feedlot's property identification code (PIC) for traceability purposes.

Horses

Each day, feedlots should record movement of all horses on and off the feedlot site.

Water

Each day, feedlots should inspect livestock water supply.

Feed

Each day, feedlots should:

- inspect new deliveries on arrival and record details, ensuring feed is fit for purpose for feeding to beef cattle
- ensure all purchased feed is accompanied by a Commodity Vendor Declaration (CVD) or a by-product vendor declaration stating that feed ingredient is free from chemical residue/contaminants.

Bedding

Feedlots should inspect bedding material is fit for purpose each day.

Employees and family

- provide employees with hand washing facilities (including soap, water and hand sanitiser) prior to feedlot entry or commencement of work
- provide employees hand washing facilities (including soap, water and hand sanitiser) in all amenity rooms and/or building, kitchen, eating rooms and meeting rooms
- ensure boots worn at the feedlot are cleaned prior to entering and leaving the feedlot
- ensure hands are sanitised on leaving the feedlot hospital area and hospital pens.

Visitors, contractors and suppliers

- maintain a register of visitors and vehicles to the feedlot
- check biosecurity awareness and record all entries in a visitor's register at a designated entry point to the feedlot (office)
- assess all visitors for their biosecurity risk
- provide visitors, contractors or suppliers hand washing facilities (soap, water and hand sanitiser) prior to feedlot entry
- consultants (e.g. nutritionists, vets) and contractors use personal equipment stored at the feedlot for site visits (boots).

Equipment and vehicles

- monitor and inspect borrowed or hired equipment prior to entry to the feedlot
- ensure different equipment is used for handling feed and manure (including dead livestock)
- restrict vehicles from entry into areas of the feedlot beyond the specified areas (designated parking area, delivery areas)

Livestock monitoring

- monitor all cattle for signs of illness and/or injury daily
- report cases of unusual illness or death to the consultant veterinarian (refer to the *EAD action plan*)
- record all cattle mortalities and cases of disease to assist monitoring for unusual animal health problems (potentially indicating a biosecurity breach)
- record movements of cattle in and out of the feedlot to facilitate tracing in the event of an animal health, disease or food safety concern.

Solid manure and effluent management

Task	Frequency of completion
• record movements of solid manure and/or compost from the feedlot site • record dates and areas of solid manure and effluent application (refer to the *National Beef Cattle Feedlot Environmental Code of Practice).*	Daily
• review requirements under AUSVETPLAN (in some emergency disease outbreaks mass decontamination and disposal of manure and effluent may be required).	Annually

Dead stock management

Task	Frequency of completion
• check all pens for dead stock early in the morning for removal as soon as practical • consider conducting post mortem for disease surveillance and/or cause of illness • dispose of dead stock according to the documented procedures (refer to the *National Beef Cattle Feedlot Environmental Code of Practice)*	Daily
• review feedlot contingency plan • review the management plan for the mass disposal of dead livestock (refer to the *AUSVETPLAN Disposal and Feedlot Enterprise Manual*) • review the local government requirements/permissions for the mass disposal of dead livestock.	Annually

Maintenance

Task	Frequency of completion
• monitor and record maintenance schedule for internal fences to minimise mixing of cattle within the feedlot.	Daily
• monitor and record maintenance schedule for perimeter fences to minimise exposure of cattle in the feedlot to stock in adjoining areas.	Weekly

Cattle identification

Task	Frequency of completion
• newly introduced cattle are identified as soon as practical (at least within seven days of arrival) • newly arrived cattle are checked on the National Livestock Identification System (NLIS) database to ensure all cattle to be fed are fit for purpose • newly introduced cattle are allocated dual identification to enhance traceability • record all newly arrived cattle, identifications and dispatched/dead cattle.	Daily
• reconcile feedlot livestock database • reconcile NLIS database for the feedlot property identification code (PIC).	Monthly

Pests and vermin

- maintain pest (birds) and vermin (rats, mice) control program – record inspections and activity
- manage flies and insects (as required)

Feral animals

Minimise the potential for introduction and transmission of disease by feral animals accessing the feedlot.

Outgoing products

Only select cattle that are in a condition fit for travel to minimise potential disease and/or contamination spread (refer to MLA's *'Fit to Load?'* guide)

Training

Task	Frequency of completion
• ensure all people involved in the daily monitoring and handling of livestock are aware of the importance of early detection of diseases and know what to do if they suspect an animal may be exhibiting symptoms of disease • ensure all people involved in the daily monitoring and handling of livestock are aware of the presence of best practice guidelines for specific diseases.	Daily
• ensure all people involved in the handling and application of chemicals, disinfectants and herbicides are competent (refer to Training – Agricultural and Veterinary Chemicals).	Monthly
• review training register to ensure all people using and applying chemicals, disinfectants and herbicides have received the appropriate training.	Every six months

Record keeping

Task	Frequency of completion
• records and documentation are maintained in line with all sections of the *National Biosecurity Manual for Beef Cattle Feedlots*.	Daily
• review the map of the layout of the property and feedlot including production areas, sheds, paddocks, access roads and gates – updating as required.	Annually

Intensive backgrounding paddocks

Each day, feedlots should:

- monitor welfare and health status (disease) – record observations
- monitor water points (cleaning as required) and feed (feeders, racks, bunks)
- restrict interaction with feral animals, pests and vermin.

Remember: the Emergency Animal Disease Hotline is available on 1800 675 888.

3.9 Livestock incident reporting

Incident reporting requirements are to be undertaken when an unusual number of sick animals or deaths occur at the feedlot. To prepare for these possible incidents, feedlots should ensure that:

- Procedures are in place to manage situations where an unusual presentation of illness or death occurs the specified periods of:
    a. any 24-hour period
    b. any consecutive 3-day period
    c. any consecutive 14-day period.
- A veterinarian is consulted to establish the cause of the incident, where a number of sick or dead animals, and/or unusual presentation of illness and death occurs within the specified periods.
- Where deaths/illnesses are suspected to be caused by an emergency animal disease implement your EAD action plan including AUSVETPLAN procedures.
- Where an emergency animal disease is confirmed not to have caused the deaths/illnesses, implement reporting procedures according to the trigger levels in Table 1, Table 2 and Table 3 below.

Table 1: Morbidity and mortality triggers over a 24-hour period.

	Level 1		Level 2	Level 3
Cattle on feed (head)	Morbidity (pulls)	Mortality (deaths)	Mortality (deaths)	Mortality (deaths)
50 to 150	10	3	6	15
151 to 500	10	3	7	16
501 to 1,000	15	3	8	17
1,001 to 3,000	25	3	11	20
3,001 to 5,000	40	4	12	21
5,001 to 7,500	55	6	30	60
7,501 to 10,000	70	7	30	60
10,001 to 20,000	140	9	50	100
20,001 to 40,000	280	11	50	100
40,001 to 60,000	350	15	50	100
60,001 and above	400	20	60	100

Table 2: Morbidity and mortality triggers within any consecutive three-day period.

	Level 1		Level 2	Level 3
Cattle on feed (head)	Morbidity (pulls)	Mortality (deaths)	Mortality (deaths)	Mortality (deaths)
50 to 150	42	6	12	31
151 to 500	42	6	14	33
501 to 1,000	42	6	16	35
1,001 to 3,000	63	6	23	42
3,001 to 5,000	84	8	25	44
5,001 to 7,500	115	12	63	126
7,501 to 10,000	147	14	63	126
10,001 to 20,000	294	18	140	230
20,001 to 40,000	588	23	160	250
40,001 to 60,000	735	31	160	250
60,001 and above	750	40	160	250

Table 3: Morbidity and mortality triggers within any consecutive 14-day period.

	Level 1		Level 2	Level 3
Cattle on feed (head)	Morbidity (pulls)	Mortality (deaths)	Mortality (deaths)	Mortality (deaths)
50 to 150	84	12	25	63
151 to 500	84	12	29	67
501 to 1,000	84	12	33	71
1,001 to 3,000	126	12	46	84
3,001 to 5,000	168	16	50	88
5,001 to 7,500	231	25	126	252
7,501 to 10,000	294	29	126	252
10,001 to 20,000	1150	37	210	400
20,001 to 40,000	1500	46	210	420
40,001 to 60,000	2100	63	210	420
60,001 and above	2500	70	210	420

Where the number of morbidities or mortalities reach trigger Level 1, the feedlot:

- consults a veterinarian and activates internal feedlot review and reporting procedures
- undertakes post-mortems at the direction of a veterinarian and records and reports all results in accordance with reporting procedures
- where a veterinarian indicates instances of atypical or unusual presentation of illness and death, representative biological samples are collected and submitted for analysis at a diagnostic laboratory.

Where the number of mortalities exceed trigger Level 2, the feedlot or its representative:

- Notifies the Australian Lot Feeders' Association (ALFA) of the incident within 12 hours. Notification to ALFA includes telephone contact and then follow up in writing including the following minimum information:
    a. name of the feedlot
    b. name and contact details of the person responsible at the feedlot
    c. name and contact details of the consulting veterinarian investigating the incident
    d. the number of cattle on feed at the time of the incident
    e. number and timing of deaths
    f. suspected cause of the incident.
- Consult a veterinarian (including a visit to the feedlot site by the veterinarian) and activate internal feedlot review and reporting procedures. Record evidence that a veterinarian attended the feedlot site.
- Undertake representative samples of post-mortems by a veterinarian and record and report all results in accordance with reporting procedures.
- Where a veterinarian indicates instances of atypical or unusual presentation of illness and death, representative biological samples are collected and submitted for analysis at a diagnostic laboratory.

Where the number of mortalities exceed trigger Level 3, the feedlot:

- undertakes representative samples of post-mortems by a veterinarian and records and reports all results in accordance with reporting procedures
- submits biological samples from a representative sample of post-mortems conducted for analysis at a diagnostic laboratory.

The feedlot or its representative should continue to provide ALFA with situational updates including further mortalities, no less than twice daily, until the incident has been resolved.

Records should also be maintained for all Level 2 and Level 3 incidents as soon as practicable after the incident that include:

- date and time of the deaths
- specific location/s
- cattle identification
- environmental conditions at the time of the incident (weather data)
- pen conditions at the time of the incident (condition of the pen surface and manure depth)
- ration formulations and feeding history
- additional information that may assist in the investigation of the incident
- records of ALFA notification in relation to the incident (includes records relevant to both Level 2 and Level 3 as appropriate).

Guidelines

Task	Frequency of completion
• record and review the numbers of pulls and dead cattle in the feedlot database. • calculate accumulated previous 24-hour, three- day and 14-day pulls (morbidity) and dead (mortality) cattle • ensure all people involved in the daily monitoring of livestock are aware of the procedures in place to manage situations where an unusual number or type of sick animals or deaths occur within any 24-hour, three-day or 14-day period • ensure all people involved in the daily monitoring of livestock understand the responsibilities of the consultant veterinarian.	Daily
• feedlot or its representative notifies the relevant organisations of an incident according to the reporting trigger levels.	When an incident occurs
• review incident reporting framework for the feedlot.	Annually

Remember: prompt incident reporting will initiate responses and support to assist the feedlot.

4. Environmental management

4.1 Environmental management

Feedlots should implement systems to ensure the environmental management requirements of the *National Beef Cattle Feedlot Environmental Code of Practice* and the relevant authority's regulations have been met.

To achieve this, feedlots should ensure that:

1. A current issue of the *National Beef Cattle Feedlot Environmental Code of Practice* (as amended) and *National Guidelines for Beef Cattle Feedlots in Australia* (as amended) are maintained.
2. Clear and achievable environmental objectives, performance indicators, operational practices and monitoring programs are documented.
3. Feedlot management is aware of and adheres to their environmental legislative requirements.
4. All relevant employees are aware of and adhere to their environmental management responsibilities.
5. Procedures are in place to reduce the potential for environmental nuisance and/or harm from the storage, use and disposal of feedlot by-products, feedlot refuse, hazardous substances and dangerous goods.
6. Environmental performance is reported as required by the appropriate regulatory authority.
7. Environmental operational practices are audited to identify opportunities for improvement against performance indicators, incorporating any such opportunity in future environmental operating practices.
8. An awareness of current and developing industry wide practices is maintained to achieve the objectives of the *Environmental Code*.
9. Stocking density is managed in the range of 9 to 25 square metres per head or per standard cattle unit (SCU) (whichever is applicable in the state and/or feedlot licence). Exemptions may be granted by AUS-MEAT when the feedlot has obtained approval in writing from the relevant state authority allowing it to operate outside 9 to 25 square metres per head or per SCU stocking density (a conversion table for calculating SCU is in the *NFAS Standards*).
10. A minimum stocking density of 2.5 square metres per head or per SCU is provided for covered or shedded cattle (recommendation only under the current industry knowledge).
11. The storage, use and disposal of hazardous substances and dangerous goods do not pose an unacceptable risk with respect to the pollution of surface water, ground water, community and ecology.
12. The facilities for the containment of feedlot by-products, feedlot refuse, hazardous substances and dangerous goods, are in place and maintained to ensure their function.

Guidelines

Task	Frequency of completion
• record daily activities related to the environment – effluent disposal, solid by-product spreading • monitor and record any adverse impacts on the environment around the feedlot • monitor feedlot stocking density.	Daily
• monitor and record disposal of used chemical containers.	Weekly
• inspect controlled drainage areas, clean water diversions, sedimentation systems, holding ponds and other associated infrastructure and record actions required as part of an internal audit. • update training for all people undertaking activities that might impact the environment and ensure they have the competencies to allow them to undertake their daily activities in an environmentally responsible manner. • monitor energy and water use • monitor fuel storages as part of an internal audit • conduct weather station check and maintenance.	Quarterly
• monitor effluent disposal.	Every six months
• sample test water, effluent, manure, soil (storage, disposal areas) for laboratory analysis • review the feedlot development consent, approval, permit and license to ensure that alignment is consistent with the feedlot performance measures • review the management system and amend accordingly to address any significant risks to the environment.	Annually

References:

National Beef Cattle Feedlot Environmental Code of Practice (as amended)

National Guidelines for Beef Cattle Feedlots in Australia (as amended)

4.2 Surface water

Feedlots should implement systems to prevent or minimise adverse impacts on surface waters external to the feedlot's controlled drainage area and external to the manure and effluent utilisation areas.

To achieve this, feedlots should ensure that:

1. The quality of surface waters external to the controlled drainage area and external to utilisation areas is not adversely affected by the on-site utilisation of feedlot wastes.
2. The structures containing and controlling runoff from within the controlled drainage area and effluent utilisation area are maintained to ensure their integrity and ongoing compliance with specified design criteria.

Guidelines

Task	Frequency of completion
• monitor and record surface water supply and storage to the feedlot (where applicable).	Daily
• monitor the controlled drainage area to ensure that diversions have sufficient integrity to prevent discharges of runoff from the feedlot complex. • monitor that runoff external to the controlled drainage area is diverted away from the controlled drainage area. • monitor the storage and use of hazardous and dangerous materials to ensure they do not pose an unacceptable risk in respect to the pollution of surface water.	Quarterly

4.3 Groundwater

Feedlots should implement systems to prevent or minimise adverse impacts on groundwater.

To achieve this, feedlots should ensure that:

1. The quality of groundwater in the vicinity of the feedlot is not adversely affected by the operation of the feedlot and the on-site utilisation of feedlot wastes.
2. The feedlot is operated to prevent or minimise the risk of new salinity outbreaks and any existing outbreaks are not exacerbated.

Guidelines

Task	Frequency of completion
• monitor and record groundwater supply to the feedlot (where applicable).	Daily
• monitor the storage and use of hazardous and dangerous materials to ensure they do not pose an unacceptable risk in respect to the pollution of groundwater.	Quarterly
• conduct water analysis (and record results) to minimise leachate or percolate from the feedlot complex and associated infrastructure contaminating groundwater. • conduct water analysis (and record results) to minimise the risk of salinity outbreaks in groundwater. • conduct soil analysis on waste management and utilisation areas to minimise any future risk of contamination or salinity outbreaks.	Annually

4.4 Community

Feedlots should implement systems to prevent or minimise adverse impacts on the amenity of the surrounding community.

To achieve this, feedlots should ensure that the feedlot is operated so that odour, dust, noise and traffic generated by the development do not unreasonably impact community amenity.

Guidelines

First impressions

- ensure the entrance to feedlot is secure, tidy and clearly signed
- restrict entry to feedlot by securing entrance gates out of normal business hours (this will enhance biosecurity and limit access without permission)
- install biosecurity signage e.g. *'Livestock Biosecurity Area'* signs
- install quarantine signage e.g. *'Quarantine Area'* signs
- install visitors signage e.g. *'Warning – no entry without permission from the landowner'* or *'By appointment only'* signs
- ensure visitor access control by creating a single admission point where visitors undergo a biosecurity check and record, Q fever check and are reminded of their WH&S obligations
- install safety signage to show speed limits, noise areas, no entry areas, machinery in operation

Remember: welcome visitors but ensure a sound management process for biosecurity and safety.

Feedlot amenity

Task	Frequency of completion
• remove dead stock immediately on identification from pens to carcase disposal area • ensure all carcases are buried or covered over in decomposition site • put in place dust control measures for roadways, cattle lanes/alleys, livestock handling, feed preparation areas • ensure mechanical equipment used on site is operated in accordance with the manufacturers' specifications • ensure vehicle movements and machinery operations within the feedlot complex are managed in regards to safety, speed, noise and dust.	Daily
• remove split feed from roadways • monitor carcase disposal area – prevent environmental harm or nuisance • maintain short grass cover in feedlot complex and immediate surrounds by mowing or slashing grass • take pest, vermin and fly control measures (as required) • timing of manure and effluent applications takes into consideration prevailing and forecast weather conditions	Weekly
• ensure visual screens (vegetative buffers) are kept in good order • inspect drainage channels, sedimentation systems, storage lagoons – clean or repair as necessary • inspection of pen surfaces and repair of pot holes as required • monitor and record road safety and traffic issues within the feedlot complex – review and action positive solutions • review the feedlot's complaints register – implement mitigation measures.	Monthly

Remember: feedlots can be operated to enhance public perception and prevent or minimise adverse impacts on people, livestock and the surrounding community.

4.5 Ecology

Feedlots should implement systems to prevent or minimise adverse impacts on native flora, fauna and ecological communities (plants and animals that are indigenous to the area).

To achieve this, the feedlot should be operated so that it does not have significant impact on remnant vegetation or ecological communities.

Guidelines

Task	Frequency of completion
• remove spilt and spoilt feed and feedstuffs from around silos, bins and feed mill area. • dispose of carcases by means that do not unduly attract pests and feral or native animals.	Daily
• monitor and action the effective control of pests, weeds and feral animals • remove spilt and spoilt feed and feedstuffs from feed lane access roads.	Weekly
• monitor the storage and use of hazardous and dangerous materials to ensure they do not pose an unacceptable risk in respect to the pollution of the local area (e.g. spill management)	Quarterly
• review the management system in relation to risks to the environment.	Annually

4.6 Feedlot wastes

Feedlots should implement systems to ensure access to sufficient natural resources, in order to sustain the operations of the feedlot and sustainably utilise nutrients contained in feedlot wastes.

To achieve this, feedlots should ensure that they can sustainably manage liquid effluent run-off from the controlled drainage area, solid by-product manure and waste products from the feed preparation areas.

Guidelines

Task	Frequency of completion
• remove dead stock immediately on identification from pens to carcase disposal area • check all carcases are buried or covered over in decomposition site • ensure timing of effluent and manure applications is recorded and takes into consideration the potential for dust and odour drift • monitor the complaints register including details of the nature of any complaint received, the response made and any mitigation measures implemented.	Daily
• ensure controlled drainage system and tailwater drains are clean and maintained so that they perform in accordance with their design capacities and capabilities • ensure land application of feedlot wastes is made at rates consistent with the ability of soils and crops grown in the utilisation areas to sustainably utilise the applied nutrients, salts and organic matter, under the prevailing climatic conditions at the site • feedlot wastes are not applied to utilisation areas where the applied materials can cause pollution of surface water, groundwater or the local environment • ensure rate of effluent application is controlled to ensure that runoff does not occur.	Weekly
• ensure embankments and drains that are part of the controlled drainage area are cleaned and maintained free of impediments to water flow.	Monthly
• monitor earthen structures of the controlled drainage area for cracking, slumping, erosion or other signs of structural problems that may lead to failure • ensure analysis of soil in the utilisation areas is monitored for the potential deterioration of soil condition • ensure natural buffers and visual screens are in good order.	Every six months

4.7 Environmental incident reporting

Feedlots should implement systems to ensure any incidents that have the potential to cause environmental harm are reported to the relevant stakeholders.

To achieve this, feedlots should ensure that:

1. Procedures are in place to address the management and communication of environmental incidents to stakeholders including but not limited to neighbours, local council and/or state government.
2. Records of any environmental incident needs to be maintained and include:

- nature of incident
- time/date of incident
- stakeholders notified (including name and position where applicable)
- actions to rectify incident.

3. If relevant, implement the environmental incident response management plans as required under environmental legislation requirements.

Guidelines

Task	Frequency of completion
• control all documentation relating to environmental activities to enable effective auditing • maintain feedlot management system to comply with the *National Beef Cattle Feedlot Environmental Code of Practice* (2nd edition or as superseded) and relevant local, state and territory jurisdiction legislations and regulations.	Daily
• responsible person notifies the relevant regulatory authorities of any overtopping events or similar threats to the environment.	When an incident occurs
• review incident reporting framework for the feedlot.	Annually

4.8 Intensive backgrounding

Feedlots should implement systems to ensure the environmental management of surface water, groundwater, ecology, erosion, ground cover and for preventing or minimising adverse impacts on the amenity of the surrounding community.

Cattle can be pre-prepared for feedlot entry in small to medium size paddocks, usually adjacent to the feedlot site but outside the feedlot's controlled drainage area. This strategy enables pre-feedlot vaccination of cattle, segregation into specific lots, comingling of cattle from different sources, feed bunk training and recovery from transport.

Guidelines

Task	Frequency of completion
• monitor and record observations around water supply, interruptions, dust, grazing intensity and fencing.	Daily
• monitor pasture/grass cover to prevent overgrazing – ensure a minimum of 70% ground cover (bare ground should be less than 30% to reduce the risk of weed invasion and erosion*).	Weekly
• monitor and assess seasonal stocking strategy for spring, summer, autumn and winter.	Quarterly
• sample and monitor groundwater, recording results.	Annually

* According to MLA's 'Maintain ground cover' guide, available at: mla.com.au/research-and-development/Environment-sustainability/Sustainable-grazing-a-producer-resource/climate-variability-using-water-wisely/maintain-ground-cover/.

References:

NSW DPI AgFacts - Maintaining groundcover to reduce erosion and sustain production

5. Product integrity

5.1 Delivery documentation

Feedlots should ensure delivery documentation is managed to ensure correct use and the accurate description of cattle.

To achieve this, feedlots should ensure that:

1. Cattle conforming to the *AUS-MEAT Minimum Standards for Grain Fed Beef* – that are going direct from a feedlot to an abattoir, saleyards or to another feedlot – are described on an NFAS Delivery Docket.
2. An authorised Quality Assurance Officer must sign the NFAS Delivery Docket. The docket is only valid for seven days from the date cattle exit the feedlot and a copy of each NFAS Delivery Docket is kept by the feedlot for at least 18 months.
3. Cattle conforming to the *AUS-MEAT Minimum Standards for Grain Fed Beef* that are dispatched from a saleyard to an abattoir or returned to a feedlot, are described on a NFAS Agent's Declaration. The agent must keep a copy of each NFAS Agent's Declaration for at least 18 months.
4. Cattle that have been fed at an NFAS Accredited Feedlot but have not met the *AUS-MEAT Minimum Standards for Grain Fed Beef* are described accurately on an NFAS Delivery Docket Form B (NFAS Form-B). An authorised Quality Assurance Officer must sign the NFAS Form B. The NFAS Form B is only valid for seven days from the date the cattle exit the feedlot and a copy of each NFAS Form B must be kept by the feedlot for at least 18 months.
5. Cattle described on a NFAS Form B cannot be subsequently described as Grain Fed Beef (GF); Grain Fed Young Beef (GFYG) or Grain Fed Finished (GFF).
6. Records of the feeding history of cattle fed at more than one feedlot during the feeding period required by the *AUS-MEAT Minimum Standards for Grain Fed Beef* are recorded on an NFAS Delivery Docket or Agent's Declaration.
7. In cases that may be considered to be an animal welfare emergency (e.g. natural disasters such as floods, cyclone or earthquake), a feedlot may request that FLIAC approve an extension of the Expiry Date of no more than seven days on an individual NFAS Delivery Docket pertaining to specified cattle affected in transit as a result. A copy of the written approval from FLIAC must be provided to the receiver of the cattle along with the original NFAS Delivery Docket and a copy must be maintained by the feedlot.
8. Carcasses of cattle identified on an individual NFAS Delivery Docket that has been granted an extension must comply with the *AUS-MEAT Minimum Standard for Grain Fed Beef* when assessed at the processing enterprise.

Guidelines

Task	Frequency of completion
• check documentation for integrity on incoming and outgoing livestock – address inconsistencies as soon as practical • check delivery dockets (LPA, NFAS, MSA, EUCAS etc) accurately describe cattle fit for purpose prior to dispatch from the feedlot • update livestock management database to reflect daily activities.	Daily
• a responsible person notifies the relevant organisations where cattle are dispatched but are not fit for purpose.	When an incident occurs
• a responsible person notifies the Feedlot Industry Accreditation Committee (FLIAC) and applies for written approval to a variation in the accredited days on feed for affected cattle.	When an animal welfare emergency occurs
• review the National Feedlot Accreditation Scheme (NFAS) standards to ensure compliance.	Quarterly
• review livestock management system and reconcile cattle numbers – physical versus system.	Annually

5.2 Feedlot rations

Feeding standards of the AUS-MEAT Minimum Standards for Grain Fed Beef and other feeding standards should be met at the feedlot.

To achieve this, feedlots should ensure that:

1. Ration analysis records are maintained which confirm the average metabolisable energy (ME) content of the fed ration in accordance with the following criteria:

- ration analysis for ME must be conducted using the Approved Standard Methodologies for the estimation of metabolisable energy
- any other methods used for ME calculation must be approved in writing by FLIAC for NFAS feedlots and records kept on file
- ration analysis must be available for the feedlot's principal rations with the most current test having been performed within the three months prior to the assigned NFAS Audit Cluster Period
- where a feedlot mixes their own ration, a typical analysis (formulation estimate) is not acceptable evidence of a ration's compliance with ME requirements of the *AUS-MEAT Minimum Standards for Grain Fed Beef*
- where a commercial ration is utilised, a specification or letter of conformity must be retained to demonstrate compliance with ME requirements of the *AUS-MEAT Minimum Standard for Grain Fed Beef.*

2. Feed fed to cattle does not contain animal products with the exception of exemptions that may be applied from time to time by statutory authorities.
3. When rations are mixed at the feedlot, people are aware of the *Australian Code of Good Manufacturing Practice for Home-Mixed Feeds*, SCA 1991 (as amended or superseded) and a copy should be available at the feedlot.

Guidelines

Task	Frequency of completion
• check that all feedstuffs are fit for purpose to feed to beef cattle • check feed ingredients are prepared according to specifications • check all rations are mixed according to the consultant nutritionist's specification • check all feed bunks at least once per day for feed remaining and to ensure bunk hygiene • deliver the allocated amount of feed accurately to each pen of cattle at least once per day • reconcile feed ingredient quantities mixed/batched with quantities allocated and fed out • ensure that no restricted animal material (RAM) has been included in the diets prepared for beef cattle.	Daily
• review all feedlot diets with consultant nutritionist.	Monthly
• conduct a laboratory analysis of sample of finisher ration to evaluate against the theoretical consultant nutritionist specification and the physical nutrient composition (can also be used for third party verification of ration criteria to meet the minimum standards for Grain Fed Beef).	Quarterly
• undertake an internal audit of ingredient storage, milling, feed preparation and distribution systems – record and action improvements or address inconsistencies.	Every six months

References:

AUS-MEAT Minimum Standards for Grain Fed Beef

Australian Code of Good Manufacturing Practice for Home-Mixed Feeds, SCA 1991 (as amended)

5.3 Grain handling and processing

Feedlots should implement systems to assist in developing procedures and requirements for grain receival, handling and storage.

Systems should also be implemented to assist in setting guidelines and key operational procedures, as well as identifying outcome measurements and standards for processing grain on the feedlot.

To achieve this, feedlots should ensure that:

1. Grain is the critical component of diets for all feedlot cattle and is essential for cattle to meet the *AUS-MEAT Minimum Standards for Grain Fed Beef.*
2. The grains that are primarily used in the feedlot industry are barley, corn, sorghum, triticale and wheat.
3. Factors that influence starch availability include the structural and chemical characteristics of the grain, the grain processing method and seasonal factors which influence grain quality (test weight, moisture content, grain size, sprouting or mould).

Guidelines

Grain receival

- review supplier vendor declarations to ensure grain is fit for purpose
- sample and assess grain quality on delivery to the feedlot – ensure grain meets minimum purchase specifications (use Grain Trade Australia standards and trading contracts)
- check the standards relevant to each grain are specified on trading contracts and align with each delivery to the feedlot and the accompanying vendor declaration
- adhere to the standard operating procedure for receiving grain and record keeping.

Grain handling

- check all grain handling equipment and machinery (as per checklist) to be in good working order – identify hazards and rectify to ensure safe use
- undertake all preventative maintenance tasks (as per checklist) prior to operation
- blow down all handling equipment and machinery at the conclusion of the daily activities.

Grain storage

Task	Frequency of completion
• ensure daily grain intakes are suitable for storage – grain moisture content, weight of grains, angle of repose of grains, abrasion of grains against contact surfaces and ease of flow of grains.	Daily
• check and maintain storage structures to ensure structures can protect grain from weather, birds, animals, insects, mites or mould damage • check and maintain grain storage temperature below 15 degrees celsius and moisture concentration below 9% (GRDC Grow Notes – Grain Storage) • record the use of insecticides or fumigants in the control of insects and moulds.	Weekly

Grain processing

- establish targets for grain processing and record achievements hourly – the aim is to achieve in the live animal a total tract starch digestability of greater than 92% and a rumen pH in the range of 5.7 to 6.2
- review grain processing targets based on grain being accessed from storage – moisture, weight, size and density.

6. Reference documents for additional information

2011 HGP Best Practice Guide (MLA)

2011 ALFA Caring for Cattle Training Guide (MLA & Pfizer)

2012 National Guidelines for Beef Cattle Feedlots in Australia (3rd Edition)

2012 National Beef Cattle Feedlot Environmental Code of Practice (2nd Edition)

2012 Australian Animal Welfare Standards and Guidelines – Land Transport of Livestock

2013 National Biosecurity Manual for Beef Cattle Feedlots (AHA)

2013 Australian Cattle Trade Rules (GTA)

2013 NLIS Database user guide (NLIS)

2013 Australian Feedlot Mud Score Key

2013 Online Chemical Accreditation (ALFA/Smith&Georg)

2014 Feedlot Plan – Survive an EAD (AHA)

2014 Pen cleaning and surface maintenance guide (MLA)

2014 Managing summer heat workshop handbook (MLA)

2014 Excessive heat load panting score chart (MLA)

2015 Feedlot Animal Welfare Officer training handbook (MLA)

2016 Australian Animal Welfare Standards and Guidelines for Cattle (AHA)

2016 Euthanasia of feedlot cattle (MLA)

2016 BRD Management manual (MLA)

2016 Feedlot design and construction manual (MLA)

2016 Waste management and utilisation manual (MLA)

2017 LPA Fact sheet – safe livestock feed (ISC)

2017 Cattle assessment manual (MLA)

2017 Heat load management in feedlot cattle – prepare (ALFA)

2017 Cattle raising claims framework (AUS-MEAT)

2018 Pregnant heifer management in feedlots (MLA)

2018 Antimicrobial stewardship guidelines for the Australian cattle feedlot industry (MLA)

2018 Best practice grain processing manual for Australian feedlot cattle (MLA)

2018 Handbook of Australian Beef Processing (AUS-MEAT)

2019 Clean cattle manual (MLA)

2019 Guide to using alternative feedstuffs (MLA)

2019 A national guide to the pre-transport selection and management of livestock (MLA)

2019 Trespass guideline and checklist for feedlot operators (ALFA)

2020 GRDC Grow Notes – Grain Storage

2020 COVID-19 Guidelines for feedlots (ALFA)

2020 COVID-19 Guide for an outbreak in a feedlot

2020 Guideline Handbook for Feedlots (MLA)

2021 NFAS Rules and Standards of Accreditation (AUS-MEAT)

Commodity Vendor Declaration (Safemeat)

Fodder Vendor Declaration (Australian Fodder Industry Association)

Stock Food Supplier Declaration (Stockfeed Manufacturers Council of Australia)

LPA National Vendor Declaration (Cattle) and Waybill (Integrity Systems Company)

7. Fact sheets

- maintaining groundcover to reduce erosion and sustain production (NSW DPI AgFacts, 2005)
- cattle and HGPs (SAFEMEAT, 2010)
- safe use of fats and oils in stock feeds for ruminants (SAFEMEAT, 2016)
- animal carcase disposal (NSW DPI, 2017)
- antimicrobials and growth promotion (MLA, 2018)
- interpreting prescription and restraint on labels (MLA, 2018)
- key points on antimicrobial stewardship (MLA, 2018)
- Q fever brief (AHA, 2018)
- trespass advice (ALFA, 2019).

8. Appendix A – Trespass directive

To be read to activists during an incursion by the person in charge:

"I am *(name and position)* of *(name)* Feedlot, the person currently in charge of this facility and notify you all that you are unlawfully on this private property.

"I revoke all lawful rights for you to be here, and I now require you to immediately move yourselves, and all your personal property off *(name)* feedlot and *(name)* property."

9. Appendix B – Standards, guidelines and legislation for shelter and shade

Key standards, guidelines and legislation for shelter and shade include:

8.1 The Australian Animal Welfare Standards and Guidelines for Cattle were adopted into the NFAS in 2018. The Standards and Guidelines prescribe that:

- S3.1: a person in charge must take reasonable actions to ensure the welfare of cattle from threats, including extremes of weather, drought, fires, floods, disease, injury and predation.
- G3.3: if practical, cattle should be provided with adequate shelter to minimise risks to welfare during inclement weather.
- G4.1: facility construction or modification should take into account:
    a. cattle behaviour
    b. topography (location and drainage)
    c. flood and fire risk
    d. climate
    e. purpose/length of confinement
    f. space
    g. feed and water space requirements
    h. shade/shelter
    i. surface materials
    j. cleaning and waste disposal.
- G10.18: feedlot operators should develop, document and implement routine management procedures to reduce the excessive heat load risks identified before they occur. These proactive strategies should include:
    a. identification of at-risk cattle source regions and groups of cattle
    b. specific selection of cattle for summer feeding programs
    c. establishment and maintenance of facilities such as shade, sprinklers, weather stations and emergency watering troughs
    d. implementation of summer diet and feeding programs
    e. implementation of strategic pen-cleaning programs
    f. excessive heat load training and management of personnel
    g. implementation of monitoring programs of weather, cattle behaviour, heat load index (HLI) and accumulated heat load units (AHLU) index.

8.2 Queensland - Animal Care and Protection Act 2001 Chapter 3 General animal offences s.18:

"A person is taken to be cruel to an animal if the person does any of the following to the animal— confines or transports it—without appropriate preparation, including, for example, appropriate food, rest, shelter or water."

8.3 New South Wales - Prevention of Cruelty to Animals Act 1979 No 200:

"A person in charge of an animal shall not fail to provide the animal with food, drink or shelter, or any of them, which, in each case, is proper and sufficient and which it is reasonably practicable in the circumstances for the person to provide."

8.4 Victoria - Prevention of Cruelty to Animals Act 1986 Part 2 Protection of Animals Chapter 9 Cruelty:

"An act of cruelty includes: the owner or the person in charge of an animal which is confined or otherwise unable to provide for itself and failing to provide the animal with proper and sufficient food, drink or shelter."

8.5 South Australia - Animal Welfare Act 1985 Part 3 Animal welfare offences Chapter 13 Section III treatment of animals:

"A person ill-treats an animal if the person — being the owner of the animal — fails to provide it with appropriate, and adequate, food, water, living conditions (whether temporary or permanent) or exercise."

8.6 Western Australia - Animal Welfare Act 2002 Division 3 s.19:

"A person in charge of an animal is cruel to an animal if the animal — is not provided with such shelter, shade or other protection from the elements as is reasonably necessary to ensure its welfare, safety and health."

Notes

Notes

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