



AUSTRALIAN INDUSTRY WELFARE STANDARDS AND GUIDELINES FOR GOATS

May 2019

This document forms part of the *Australian Animal Welfare Standards and Guidelines for the Welfare of Animals*.

This document will be reviewed yearly.

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Preface

The objective of this project was to establish Industry Welfare Standards and Guidelines for Goats (S&G) that reflect contemporary scientific knowledge, provide competent animal husbandry advice, and meet mainstream community expectations. A further objective was for the goat welfare standards and guidelines to serve as a template for a nationally uniform regulatory approach to goat welfare should that be considered desirable at a later date.

The objectives of the development of *the Australian Industry Welfare Standards and Guidelines for Goats* is consistent with one of the strategic priorities identified in Animal Health Australia's (AHA) Strategic Plan 2015-2020; being to strengthen biosecurity, surveillance and animal welfare to enhance animal health, and support market access and trade. The rationale is to provide tools for animal welfare that facilitate industry uptake of best practice to allow measurement of improvement in welfare outcomes through industry verification systems and to support market access. The development process used in drafting these standards and guidelines allows industry to examine goat health and welfare issues and determine a suitable industry position that meets community expectations.

Goat Industry Council of Australia (GICA) took the initiative to fund the development of the *Australian Industry Welfare Standards and Guidelines for Goats* and they intend to continue to facilitate voluntary industry compliance with contemporary animal welfare standards for goats managed under Australian conditions and husbandry systems. It is recognised that, while currently legislated animal welfare requirements will continue to be mandatory, the voluntary industry standards and guidelines have the capacity to inform the future development of a nationally uniform legislative approach to goat welfare.

Additional funding was received from AgriFutures Australia (previously known as the Rural Industries R&D Corporation (RIRDC)) to conduct and develop communications on the *Australian Industry Welfare Standards and Guidelines for Goats* to the dairy and fibre goat sectors. This communications material is intended to assist industry in achieving a high level of voluntary adoption of the standards and guidelines.

Introduction

Purpose

For the past 40 years, the welfare of livestock in Australia has been supported by a series of Model Codes of Practice for the Welfare of Animals (MCOP). As community values and expectations have changed, and our international trading partners have placed greater emphasis on livestock welfare, the usefulness and relevance of these Codes has been called into question, as has the process by which these Codes have been revised and developed. A review of the Model Codes of Practice in 2005 recommended they be converted into Australian Animal Welfare Standards and Guidelines.

One of the key objectives was to facilitate consistency of legislation across states and territories for improved and sustainable animal welfare outcomes.

In September 2012 the Australian Animal Welfare Standards and Guidelines Land Transport of Livestock were developed by AHA, followed by the Australian Animal Welfare Standards for Cattle and the Australian Animal Welfare Standards for Sheep in May 2014.

Under the previous Australian Animal Welfare Strategy (AAWS), AHA developed standards and guidelines under a member agreed business plan. This AHA business plan incorporates elements of the current Animal Welfare Task Group (AWTG) plan and provides further detail on essential elements for members and other stakeholders. At the request of the GICA, AHA has facilitated the development of these voluntary industry standards and guidelines, an undertaking which lies outside the scope of the current priorities and work plan of the AWTG.

Scope

The industry standards and guidelines apply to all goat farming enterprises in Australia from extensive grazing to fully housed systems to individually owned goats. The industry standards and guidelines apply to all those responsible for the care and management of goats. 'Goat' includes any *Capra aegagrus hircus*.

These industry standards and guidelines should be considered in conjunction with other requirements for livestock, and related Commonwealth, state and territory legislation, including:

- Model Codes of Practice for the Welfare of Animals: The Goat, PISC/SCARM Report Series 32, CSIRO Publishing, 1991
- for goat enterprises — model codes of practice or standards and guidelines for livestock species, saleyards, livestock processing (slaughter) establishments and the *Australian Standards for the Export of Livestock*
- for transport — *the Australian Animal Welfare Standards and Guidelines — Land Transport of Livestock, Australian Standards for the Export of Livestock*, livestock health and biosecurity requirements, and regulated livestock loading schemes and driver regulations
- for research and teaching purposes — *Australian Code for the Care and Use of Animals for Scientific Purposes*, 8th edition, 2013.

Where legislation requires a higher welfare standard, the higher standard will apply e.g. Human safety is the primary concern. Animal welfare procedures and monitoring must only be carried out if it is safe to do so. Some provisions such as handling standards will apply in other enterprises if there are not already higher provisions in place, such as during transport or at abattoirs or saleyards. Where there is a conflict with another standard in meeting the livestock welfare standards, the welfare of livestock must be the first consideration unless there is a work health and safety requirement.

Cruelty and unacceptable animal welfare practices can be prosecuted under cruelty and aggravated cruelty offence clauses in animal welfare legislation. For example, goats must not be allowed to die from lack of feed or water.

Advice or assistance with welfare management and disease control is available from state and territory departments of agriculture, locally based private consultants or veterinarians, as appropriate. These Australian industry standards and guidelines do not endeavour to describe 'best practice', because it is often too difficult to reflect known regional variation. There are other industry and government documents to better communicate these industry practices that also consider regional variations.

Interpretation

The *Australian Industry Welfare Standards and Guidelines for Goats* are intended for voluntary adoption by industry. In contrast with the processes currently used to develop regulated animal welfare standards and guidelines, certain formal public consultative steps (such as the development of a Regulatory Impact Statement) were not utilised during the development of these voluntary industry standards and guidelines.

The established methodology used in other standards and guidelines development have been used in this project.

Standards are written as if they were to be the legal requirements for livestock welfare and use the word 'must'. The standards could, in the future, provide the basis for developing and implementing consistent legislation and enforcement across Australia, including for industry Quality Assurance (QA) schemes.

The four main decision-making principles¹ used for developing the standards are:

- desirable for livestock welfare
- feasible for industry and government to implement into the future
- important for the livestock-welfare regulatory framework
- will achieve the intended outcome for livestock welfare.

Good biosecurity practice has positive outcomes for goat welfare and underpins the outcomes of this document in the context of preserving goat health.

¹ Adapted from HA Linstone and M Turoff (2002). 'The policy delphi', chapter III.B.I in *The Delphi Method: Techniques and Applications*, New Jersey Institute of Technology 2002.

The standards are intended to be clear, essential and verifiable statements. However, not all issues are able to be well defined by scientific research or to be quantified. They are presented in a box and are numbered, with the prefix 'S'.

The guidelines are the recommended practices to achieve desirable livestock welfare outcomes. Guidelines use the word 'should' and are designed to complement the standards. Non-compliance with one or more guidelines will not constitute an offence under law in situations where the standards are adopted into law. In this document both standards and guidelines are intended to be voluntary.

The development process for the standards and guidelines is transparent and inclusive. Relevant scientific literature and current practice are utilised to support an evidence-based approach. Select targeted consultation has been undertaken to seek relevant views to satisfy the two domains above.

Note the use of 'a person' or 'a person in charge' in the standards. 'A person' means anyone interacting directly with goats. The reference can be to more than one person (plural) and not just a specific person. Use of 'a person in charge' is appropriate where responsibility is shared and may extend along a hierarchy of management to include all levels of management and ownership as appropriate. In contrast, the term 'the person in charge' usually relates to a single, specific person.

Some standards describe the required welfare outcomes, without prescribing the exact actions that must be done.

The 'risk to welfare of a goat' is the potential for a factor to affect the welfare of a goat in a way that causes pain, injury or distress to a goat. The outcome could include sunburn, hypothermia, heat stress, dehydration, exhaustion, abortion, emaciation, injury, disease, distress or death. These risks can be managed by undertaking reasonable actions to prevent or reduce the risk.

A 'reasonable action(s)' are those actions regarded as reasonable to be done by a reasonable person with the relevant knowledge, skills and experience in the circumstances to address a problem, as determined by accepted practice and by other similarly experienced people. It is not intended that all reasonable actions are described in this document.

In the context of these standards, the term 'at the first reasonable opportunity' means within the time-frame that would be expected by a reasonable person with the relevant knowledge, skills and experience in the management of livestock given the urgency of the situation in relation to the welfare of the livestock.

Principles for goat welfare

Goats in Australia are managed in environments that vary from extensive rangelands to intensively managed systems and include individually owned goats.

The large variation of production systems is addressed through the interpretation of reasonable actions.

In all cases, the people in charge of goats are responsible for the welfare of the animals under their control. In achieving improved welfare outcomes envisaged by the standards, it is important that people responsible for animals have the necessary knowledge, experience and skills to undertake the various procedures and meet the requirements of the standards, in a manner that minimises the risk to goat welfare.

Adherence to good animal husbandry principles is essential to meet the welfare requirements of animals. Goats strongly prefer to be with other goats in a herd. Good husbandry principles that also meet the basic physiological and behavioural needs of goats include:

- a level of nutrition adequate to sustain good health and welfare
- access to sufficient water of suitable quality to meet physiological needs
- social contact with other goats
- sufficient space to stand, lie and stretch their limbs and perform normal patterns of behaviour
- handling facilities, equipment and procedures that minimise stress
- procedures to minimise the risk of pain, injury or disease
- provision of appropriate treatment, including humane killing if necessary
- minimising the risk of predation
- provision of reasonable precautions against extremes of weather and the effects of natural disasters
- selection and breeding of goats appropriate for the environment and the level of planned herd management to be provided
- assessment of the need to undertake any husbandry procedures that may result in significant short-term pain against alternative strategies for the long-term welfare of the goat
- undertaking any husbandry procedures required for planned herd management in a manner that reduces the impact of these procedures and minimises risks to goat welfare
- innovative husbandry and housing systems which enhance goat welfare should be encouraged, and applied to commercial farming as practical.

1 Responsibilities

Objective

A person knows their responsibilities for goat welfare and is able to perform the required tasks to minimise the risk to the welfare of goats.

Standards

S1.1	A person must take reasonable actions to ensure the welfare of goats under their control.
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Guidelines

G1.1 Elements of responsibility for goat management should include:

- understanding the standards and guidelines for goat welfare
- obtaining knowledge of relevant local government regulations related to goat keeping
- obtaining and demonstrating knowledge of relevant animal welfare laws
- understanding goat behaviour and use of low stress stock handling techniques
- planning and undertaking actions for the enterprise to meet the welfare standards and address contingencies that may arise
- assessing the quantity, quality, palatability and continuity of feed and water supply
- handling techniques which minimise stress, including appropriate drafting and using handling aids, facilities and other equipment appropriately
- undertaking hygienic husbandry procedures in a manner that minimises the risks to goat welfare
- understanding and following instructions for the administration of chemicals and drugs to goats
- identifying distressed, weak, injured or diseased goats, and taking appropriate action
- knowledge of local patterns of disease and biosecurity practices to prevent disease
- maintaining appropriate records
- humanely killing goats by appropriate methods, or seeking the assistance of someone who is capable and equipped to kill them humanely.

G1.2 Agistment responsibilities should be communicated, documented and clearly understood by all parties involved.

G1.3 Owners, managers and stockpersons of goats should have an appropriate staff induction program, periodically review existing practices, and be aware of new developments and training.

2 Feed and water

Objective

Goats have access to feed and water to minimise the risk to their welfare.

Standards

S2.1	A person in charge must ensure goats have reasonable access to adequate and appropriate feed and water.
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Guidelines

- G2.1 Goats should have access to feed and water daily, except where reasonable management practices, such as shearing, preparation for sale, transport, slaughter and drenching, result in a longer period of water deprivation, to a maximum of 48 hours. Feed and water deprivation exceeding 48 hours should be avoided.
- G2.2 If sufficient feed and water cannot be provided to goats, options that should be considered are to relocate, agist, sell or humanely kill the goats before welfare is adversely affected.
- G2.3 Assessment should be made of the needs of the goat in relation to the quantity and quality of feed and water.
- G2.4 Goats grazing dry pastures or crop stubbles should be provided with appropriate energy and protein supplements as required.
- G2.5 Self feeders and watering points should be checked regularly and maintained.
- G2.6 Access by goats to contaminated and spoilt feed, toxic plants and harmful substances should be managed and avoided where possible.
- G2.7 Goats should be gradually introduced to any change of diet to enable them to adapt and to prevent digestive problems, and should be closely monitored.
- G2.8 Goats should be closely monitored during transition to varying water quality (e.g. mineral content, salinity, etc.) and watering systems to ensure that they are drinking. Alternate water supplies should be provided if goats are observed not to be drinking.
- G2.9 A body condition or weighing system should be used as a guide for the monitoring and planned feeding of goats.
- G2.10 Kids should be supplementary fed together with does (imprint feeding) before weaning, where appropriate for the production system, so that the kids learn to accept supplementary feed.
- G2.11 Weaned kids should be provided with appropriate energy and protein supplements to ensure weight gain.

G2.12 Goats held in traps should have access to feed and water daily.

3 Risk management of extreme weather, natural disasters, disease, injury and predation

Objective

Goats are managed to minimise the impact of threats to their welfare, including extremes of weather, natural disasters, disease, injury and predation.

Standards

- S3.1 A person in charge must take reasonable actions to ensure the welfare of goats from threats, including extremes of weather, drought, fires, floods, disease, injury and predation.
- S3.2 A person in charge must ensure the inspection of goats is at regular intervals, and at a level appropriate to the production system and the risks to the welfare of goats.
- S3.3 A person in charge must ensure appropriate treatment for sick, injured or diseased goats at the first reasonable opportunity.

Guidelines

Contingency planning, inspection and drought management

G3.1.1 Contingency plans should address events which could result in a potentially significant welfare impact on goats.

G3.1.2 Contingency plans to minimise risks to goat welfare should include:

- emergency contact details
- breakdown or mechanical failure affecting feed, water or ventilation
- adverse weather — specifically conditions that predispose goats to heat or cold stress (temperature extremes, wind, storm)
- flood, fire and drought
- disease outbreak or injury
- personal accident or injury
- other issues specific to the enterprise or goats being managed.

G3.2 Inspection of goats should take into consideration:

- feed on offer
- water supply
- age
- pregnancy status

- adverse weather conditions
 - disease risk
 - predation risk
 - recent management procedures
 - suitability of facilities including fencing and shelter.
- G3.3 Goats that appear to be isolated from the herd, caught in structures or bogged should be inspected and appropriate action taken without delay.
- G3.4 Drought strategies should be prepared in advance and then progressively implemented as required. Strategies should be implemented before feed on offer is depleted and may include:
- relocation or agistment
 - supplementary feeding and use of stock containment areas
 - sale
 - segregation according to risk
 - early weaning
 - humane killing.
- G3.5 Goats being fed in a drought situation should be carefully observed. Weak goats and shy feeders may require segregation to ensure appropriate treatment and nutrition.
- G3.6 Goats held in traps should be inspected daily.

Weather

- G3.7 Goats and kids should be provided with adequate shelter. In the absence of natural protection, consideration should be given to the provision of shade, windbreaks or other forms of shelter including sheds.
- G3.8 Goat handling should be minimised during extreme weather and particularly during extremely hot and cold weather.
- G3.9 Shorn goats should be given protection during cold and windy conditions and sudden weather changes.
- G3.10 Protection for goats around shearing may include:
- postponing shearing
 - using stud combs
 - providing shelter
 - providing wind breaks
 - providing additional feed and watering points.

Predators

- G3.11 Predator control programs should be implemented where predation is a risk to the welfare of goats.

Disease and injury prevention

- G3.12 A biosecurity and welfare plan should be in place for the introduction of goats to the system.
- G3.13 Diseased and injured goats should be separated from non-affected goats until the condition resolves, is treated or the goat humanely killed.
- G3.14 Advice on goat disease prevention or treatment should be sought from qualified advisors. A health management plan should include biosecurity practices and be devised and implemented to protect goats from disease introduction.
- G3.15 Any medication which does not bear specific instructions for treatment of goats should only be used on veterinary advice.
- G3.16 Treatments and vaccines should be administered in accordance with directions. Records of treatments should be kept.
- G3.17 Managed goats should be vaccinated against relevant diseases.
- G3.18 Internal and external parasites should be monitored and controlled in managed goats.
- G3.19 When emergency killing is necessary, it should be performed on the property.
- G3.20 Dead goats should be appropriately disposed of as soon as possible.
- G3.21 Unexplained disease and deaths should be investigated to formulate appropriate remedial and preventive actions.

4 Facilities and equipment

Objective

Facilities and equipment are appropriate to minimise the risk to the welfare of goats.

Standards

S4.1 A person in charge must take reasonable actions in the construction, maintenance and operation of facilities and equipment that is used for the husbandry of goats.

Guidelines

- G4.1 Facility construction or modification should take into account:
- goat behaviour
 - topography (location and drainage)
 - flood and fire risk
 - climate
 - purpose/length of confinement
 - space
 - feed and water space requirements
 - shade/shelter
 - surface materials
 - cleaning and waste disposal
 - fence design suitable for goats and the type of goats being contained.
- G4.2 Shade should be considered in hot weather for outdoor pens where goats are penned for extended periods.
- G4.3 Shade and shelter should be provided to prevent heat and cold stress.
- G4.4 Floor surfaces should be nonslip, nonabrasive and free-draining. Concrete is only recommended for high-traffic areas.
- G4.5 Pen surfaces should be constructed and maintained in a way that reduces the build-up of manure and urine.
- G4.6 Pen surfaces should be maintained to minimise slipping and injury.
- G4.7 Facilities should be free from protrusions and obstacles that may cause injury.
- G4.8 All electrical fittings and attachments to mains voltage should be out of reach of goats, or protected from interference or damage by goats.
- G4.9 Dust should be minimised within yards and smaller holding paddocks.

G4.10 Fencing and yard construction should prevent injury, entrapment and overcrowding.

G4.11 Facilities and equipment for restraining goats should only be used:

- for the minimum time necessary
- with the minimum restraint necessary.

5 Handling and husbandry

Objective

Handling and husbandry practices are appropriate and minimise the risk to the welfare of goats.

Standards

- | | |
|------|--|
| S5.1 | A person must handle goats in a reasonable manner. |
| S5.2 | A person handling goats must not: <ol style="list-style-type: none">1) lift goats off the ground by only one leg, or by the head, ears, horns, neck, tail or fibre, unless in an emergency; or2) throw or drop goats, except to land on their feet from a height of less than 1.5 metres; or3) strike, punch or kick goats; or4) drag goats that are not standing by only one leg, except in an emergency to allow safe handling, lifting, treatment or humane killing; or5) drag goats by only the ears, horns, or tail; or6) drag goats by mechanical means, except in an emergency, for the minimum distance to allow safe handling, lifting, treatment or humane killing. |
| S5.3 | A person in charge must take reasonable action, where goats have not adapted to confinement within a reasonable period of time. |
| S5.4 | A person in charge of a dog that habitually bites goats must ensure the dog is muzzled while working goats. |
| S5.5 | A person in charge must ensure goats that grow and retain long fleece are shorn annually. |
| S5.6 | A person must consider the welfare of goats when using an electric prod, and must not use it: <ol style="list-style-type: none">1) on genital, anal, or udder areas of goats; or2) on facial areas, unless goat welfare is at risk; or3) on goats less than three months old unless goat welfare is at risk or;4) on goats that are unable to move away; or5) on visibly pregnant goats; or6) on visibly weak, injured or sick goats; or7) in an unreasonable manner on goats. |

S5.7 A person in charge must ensure that tethered goats are able to exercise daily.

Guidelines

Handling

- G5.1 Goats should be handled to take advantage of their natural herding behaviour when mustering, yarding and handling. People handling goats should have an understanding of the flight zone and low stress stock handling methods.
- G5.2 Drafting of goats into classes should be done as soon as possible.
- G5.3 Goats should be grouped with others of the same class and where possible with others that they are already familiar with to minimise bullying and riding behaviour.
- G5.4 Goats subjected to persistent bullying should be removed from the herd.
- G5.5 Unnecessary goat handling should be avoided during extreme weather.
- G5.6 Goats should be caught and restrained with care. Horned goats may be restrained by holding the horn at its base, not at its tip, as this may cause the horn to break.
- G5.7 Tails should not be twisted when moving goats.
- G5.8 Goats should be returned to feed and water as soon as possible after handling.
- G5.9 Extra care should be taken when handling goats with special needs — for example, young kids, heavily pregnant does and lame goats.
- G5.10 Care should be taken when handling, catching or restraining a segregated goat, to minimise the risk of serious injury to the goat. Handling practices and facilities should be appropriate to manage these risks.
- G5.11 Goats should be restrained and isolated for the minimum time necessary. Goats isolated in a pen should be provided with a pen mate, unless isolated due to illness or quarantine, then they should be housed within sight and sound of other goats.
- G5.12 The use of dogs and handling aids should be limited to the minimum needed to complete the task.
- G5.13 After mustering or droving, goats should be provided with suitable conditions and given time to settle down, mother up or find shelter before further handling takes place or before the onset of darkness.
- G5.14 During mustering, goats should be rested or allowed to walk slowly if they show signs of laboured breathing.
- G5.15 Overcrowding of goats in races, pens or yards should be avoided. Precautions should be taken to prevent smothering, especially for kids and weaners.

Tethering

G5.16 A person tethering goats should:

- ensure the tether is long enough to allow adequate exercise and grazing
- ensure the tether does not become entangled
- ensure goats have adequate shelter
- inspect the goats a minimum of once per day
- not tether goats by the leg or hoof.

G5.17 Tethered and confined goats should have enough space to be able to lie down, stretch, stand up and to exercise. They should have access to shelter, food and water and protection from predation.

G5.18 Goats should not be permanently tethered by lengths less than 4 body lengths, unless selective veterinary therapy under shorter tether is prescribed.

G5.19 Sheds or arks (mobile sheds) provided for tethered goats should be of sufficient size to allow the goat to stand up, turn around and lie down.

G5.20 Collars, ropes, chains, swivels and similar materials used for tethering of goats should be constructed so as to avoid injury and pain.

Husbandry

G5.21 Temporary yards should be used where appropriate for husbandry procedures.

G5.22 Spray dips for treatment of external parasites should be used in preference to plunge dipping.

G5.23 Operators should adopt practices to manage risk from dipping and other forms of ectoparasite treatments, which include treatment failure, post-dipping infections and injury. If dipping goats, take into consideration:

- that adverse weather is not prevailing or predicted
- that goats should not be overloaded in the dip
- the use of disinfectant if dipped immediately after shearing.

G5.24 Feet should be inspected as appropriate and any necessary action taken.

G5.25 Hoof trimming should be performed if necessary to remove over-growth of the hoof.

G5.26 Operators should adopt practices to manage risk from drenching and other forms of oral treatments, which include treatment failure, toxicity, inhalation of the medication and injury. This applies to treatments with solutions, suspensions, pastes, capsules or any form of bolus, including bullets.

G5.27 Manufacturer's and/or your veterinarian's instructions should be followed for husbandry procedures for goats, including earmarking, tattooing, tagging, drenching and vaccination and should be done in a way that minimises the risk of infection.

G5.28 Goats fitted with collars, coats or rugs should be inspected regularly to ensure that they do not become tangled, cast or adversely affected by grass seeds.

Fibre harvesting/shearing

G5.29 Care should be taken when shearing and crutching to minimise cuts, and severe cuts should be treated at the first reasonable opportunity.

G5.30 When harvesting fibre, consider:

- stopping if cold, wet and windy weather is experienced or predicted and adequate shelter is not available
- releasing newly shorn goats into adequate shelter or allowing goats to remain in the shed until the weather risk has passed
- ensuring there is adequate feed and water available for newly shorn goats.
- Taking extra precautions in the first six weeks post-shearing, depending on body condition, pregnancy status and seasonal weather conditions.

G5.31 Bucks that are sedated for shearing or crutching should be managed to prevent exposure, sunburn and smothering and in accordance with the directions of the prescribing veterinarian.

6 Castration, disbudding and dehorning

Objective

Castration, disbudding and dehorning is done only when necessary, and in a manner that minimises the risk to the welfare of goats, particularly pain and distress.

Standards

- S6.1 A person performing castration, disbudding and or dehorning must have the relevant knowledge, experience and skills, or be under the direct supervision of a person who has the relevant knowledge, experience and skills.
- S6.2 A person must not castrate goats that are more than six months old without using appropriate pain relief and haemorrhage control for the goat.
- S6.3 A person in charge must ensure the use of appropriate pain relief when dehorning goats more than six months old.
- S6.4 A person must use appropriate tools and methods to dehorn goats and disbud kids.
- S6.5 Disbudding by means of chemicals must not be performed on goats.
- S6.6 Scoop dehorning must not be used on goats.
- S6.7 Elastrator rings must not be used for dehorning goats.

Guidelines

- G6.1 Castration, disbudding and dehorning should only be done where there are no alternatives and the procedure results in:
- benefits to life-time goat welfare
 - better herd management
 - a reduced work (occupational) health and safety risk.
- G6.2 Castration, disbudding and dehorning should be accompanied by pain relief when practical and cost-effective methods become available. Operators should seek advice on current pain minimisation strategies.
- G6.3 Castration, disbudding and dehorning should be undertaken after a secure maternal bond has been established.
- G6.4 Castration, disbudding dehorning and other marking procedures should be planned with consideration of the age of kids, weather, staff availability and facilities, including the use of temporary or permanent yards.

- G6.5 Castration dehorning and disbudding should not be undertaken during extreme weather.
- G6.6 Castration, disbudding and dehorning should be done when fly activity is minimal, or in conjunction with appropriate preventive flystrike treatments.
- G6.7 Good hygiene practices should be practiced in relation to facilities, hands, handling and instruments. Disinfectant should be used and changed frequently.
- G6.8 Infection should be minimised by avoiding muddy or dusty yards, and wet or humid weather.
- G6.9 Operators should adopt appropriate strategies to minimise the risk and impact of common infections, through vaccination of kids and/or their mothers.
- G6.10 Kids should be appropriately restrained in a kid cradle and, when released, should land on their feet to avoid contact of the wound(s) with the ground.
- G6.11 Kids should be separated from their mothers for the shortest possible time.
- G6.12 Haemorrhage should be minimised by selecting an appropriate method, preventing overheating of kids and allowing them to settle after mustering.
- G6.13 Goats should be inspected regularly and with minimal disturbance for signs of post-operative complications during the healing process, and appropriate action taken.
- G6.14 After placement in paddocks, kids should not be forcibly mustered and yarded until wounds are healed.

Castration

- G6.15 Kids should be castrated as young as possible and before they are 12 weeks old.
- G6.16 A person should use the most appropriate tools and least painful method to castrate goats that is applicable to the production system.
- G6.17 Surgical castration without the use of pain relief should be confined to bucks under 12 weeks of age.

Disbudding, dehorning and horn trimming

- G6.18 Preference should be given for breeding of naturally polled goats, taking into consideration the intersex/pseudohermaphrodite risks.
- G6.19 Disbudding should be done in preference to dehorning.
- G6.20 Kids should be disbudded as young as possible.
- G6.21 Hot-iron cautery should be used in preference to excision methods for disbudding kids.
- G6.22 Horn tipping should be done in preference to dehorning.

- G6.23 Tipping should only remove a solid, nonvascular portion of the horn, and result in a blunt horn end.
- G6.24 Horn trimming or the removal of sharp horn points should be performed to minimise injury to other goats.

7 Breeding management

Objective

Breeding and management practices are appropriate and minimise the risk to the welfare of goats.

Standards

- S7.1 A person performing artificial breeding procedures on goats must have the relevant knowledge, experience and skills, or be under the direct supervision of a person who has the relevant knowledge, experience and skills.
- S7.2 A person performing artificial breeding procedures on goats must not cause unreasonable pain, distress or injury to goats.
- S7.3 A person must be a veterinarian, or operating under veterinary supervision, to perform surgical embryo transfer and laparoscopic insemination of goats and be done using appropriate sedation, analgesia and aseptic technique.
- S7.4 A person in charge must ensure kidding induction is only performed under veterinary advice.

Guidelines

- G7.1 Persons responsible for breeding management should have an understanding of reproduction and behaviour of both the doe and the buck.
- G7.2 The timing and duration of the joining period should be managed to align with feed availability for the doe and kids, and to reduce weather risk for kids.

Does and kidding

- G7.3 In the last 4–6 weeks of pregnancy, management practices should minimise stress on does to reduce stress-induced abortion/premature birth, pregnancy toxemia and other metabolic diseases.
- G7.4 Does kidding in yards should be segregated from the main herd as soon as possible.
- G7.5 Does that receive severe injuries during kidding or that are affected by a severe adverse outcome (prolapsed uterus, unable to deliver kid) should receive urgent treatment or be humanely killed without delay.
- G7.6 Kidding does should be placed in a sheltered paddock with quality feed, especially if there is a risk of cold, wet or windy weather.
- G7.7 Kidding does should be monitored, but disturbed as little as possible.
- G7.8 Excessive force should not be used when assisting does to kid.

G7.9 Predators should be specially targeted before, during and after kidding.

Newborn kids

G7.10 Weak or orphaned kids including premature kids with very little chance of survival should be humanely killed without delay.

G7.11 Hand-reared kids should be given suitable liquid feeds (milk or milk replacer) until the rumen has developed sufficiently to allow them to use solids as the sole feed source.

G7.12 Every kid should receive colostrum as soon as possible after birth, preferably within the first six hours. If it is suspected that a kid has not received colostrum, then colostrum or a suitable substitute should be given to the kid within 24 hours of birth.

G7.13 Kids should not be weaned earlier than eight weeks of age to ensure adequate rumen development.

Bucks

G7.14 Bucks should be checked at regular intervals for injuries and disease.

Laparoscopic artificial insemination and embryo transfer

G7.15 Semen collection using an artificial vagina should be used in preference to electro-ejaculation.

G7.16 Does should be handled and restrained for the shortest duration and as gently as possible. Does should spend the minimum amount of time in the inverted position.

8 Dairy management

Objective

Dairy goats are managed to minimise the risk to their welfare.

Standards

- S8.1 A person in charge must ensure the daily inspection of lactating does.
- S8.2 A person in charge must implement appropriate actions to minimise the stress from adverse weather on lactating does.
- S8.3 A person in charge must ensure dairy goats that are kept on feed pads for extended periods have access to a well-drained area for resting.

Guidelines

- G8.1 During hot weather, drinking water should be available at all times.
- G8.2 Milking machinery and equipment should be regularly tested and maintained.
- G8.3 The milking technique should minimise the risk of discomfort, injury and disease.
- G8.4 Regular routines for milking should be established, in order to minimise or avoid distress.
- G8.5 Dairy goats in full lactation should not be left for more than 24 hours without relief by milking.
- G8.6 A lameness management strategy should be implemented and should include practices for prevention, early detection and effective treatment.
- G8.7 A mastitis management strategy should be implemented and should include practices for prevention, early detection and effective treatment.
- G8.8 If it is deemed necessary to remove extra teats, the procedure should be done expertly and hygienically as soon as they can be identified.

9 Intensive goat production systems

Objective

Goats in intensive production systems are managed to minimise the risk to the welfare of goats.

Standards

S9.1	A person in charge must ensure that feed and water is available and accessible daily to goats in intensive production systems.
S9.2	A person in charge must ensure the daily inspection of all goats in the intensive production system.
S9.3	A person in charge must take reasonable action where goats have not adapted to an intensive production system.
S9.4	A person in charge must not allow faeces and urine to accumulate to the stage that compromises the welfare of goats in an intensive production system.
S9.5	A person in charge must ensure an indoor housing system for goats has effective ventilation.
S9.6	A person in charge must ensure sufficient space to allow all goats to lie on their sternums at the same time in an intensive production system.
S9.7	A person must not permanently house a goat in a single pen.

Guidelines

Feed and water

- G9.1 Drinking equipment should be inspected regularly and maintained to ensure its correct operation, and that pipes, taps and ball valves are not blocked.
- G9.2 Water troughs should be cleaned as required to remove any contamination.
- G9.3 Feed troughs should be cleaned as required to remove faecal contamination and build-up of stale or spoiled feed and dust.
- G9.4 Trough space should be adequate for the feeding system to allow the daily intake of feed and water, and to minimise bullying and shy feeders.
- G9.5 Goats should be gradually introduced to any change of diet to enable them to adapt and to prevent digestive problems, and should be closely monitored.
- G9.6 Sufficient fibre should be provided in the diet to stimulate rumination.

Management

- G9.7 Managers of intensive systems should be aware of current information in intensive goat management and health, and have contact with professionals with relevant expertise.
- G9.8 Goats should be grouped with others of the same class and where possible with others that they are already familiar with to minimise bullying and riding behaviour.
- G9.9 Goats in the first week of confinement should be monitored and inspected.
- G9.10 During inspections particular attention should be given to:
- identifying signs of sickness, digestive conditions or injury
 - assessing feed and water intake
 - checking feed and water facilities
 - identifying shy feeders
 - identifying stereotypic behaviours early, such as repetitive motion, fibre biting and mouthing of railings.
- G9.11 Special attention should be given to shy feeders. Management options for shy feeders may include:
- reducing pen density
 - drafting goat to pens based on size of goats
 - altering trough design to enhance feed access
 - removing them from the system.
- G9.12 Lighting in indoor systems should be adequate to allow inspection of all goats.
- G9.13 Goats should not be housed in single pens for any longer than is necessary.

Disease prevention

- G9.14 A biosecurity and welfare plan should be in place for the introduction of goats to the system.
- G9.15 Prior to entry into an intensive system, goats should be vaccinated, treated for parasites and inspected for disease.
- G9.16 Intensive systems should have hospital pens for sick or injured goats.
- G9.17 Dead goats should be removed and appropriately disposed of as soon as possible.

Pen density

G9.18 When determining space allowance per goat, consideration should be given to:

- environment
- group size
- age
- sex
- live weight
- pregnancy status
- presence of horns
- provision of feed and water
- behaviour of stock.

G9.19 Table 9.1 should be used as a guide for the minimum space allowances per goat in a pen or feedlot.

Table 9.1 Minimum space allowances

Single pens	Minimum space allowances (m ²)
Wether or dry doe	2.0
Buck, pregnant doe or heavy wether	2.0
Kid	0.6
Doe with kid	2.5
Group pens	
Less than 8 goat	1.0
8–15 goat	0.9
16–30 goat	0.8
31 or more goat	0.8
Outdoor feedlots	
Kids up to 41 kg	1.5
Adult goat	2.5
Heavy wether	2.0
Doe and kid(s)	3.0

Note: Miniature and pygmy goats may need less space depending on size.

Facilities and environment

G9.20 Dust should be minimised within the intensive system.

G9.21 Pen surfaces should be constructed and maintained in a way that reduces the build-up of manure and urine.

- G9.22 Pen surfaces should be maintained to minimise slipping and injury.
- G9.23 Shade and shelter should be provided to prevent heat and cold stress.
- G9.24 All ventilation equipment should be checked to ensure it is fully operational.
- G9.25 Indoor housing systems with controlled or forced ventilation that rely on automatic equipment should be inspected daily, or have a back-up system to warn of mechanical failure.
- G9.26 Natural or artificial light levels should be adequate for all goats housed in indoor systems and to allow inspection.

Contingency arrangements

- G9.27 A contingency plan should be in place for the following:
- water supply interruption
 - feed supply interruption
 - disease outbreak
 - extreme weather conditions (heat and cold stress)
 - personal accident or injury
 - fire or flood
 - power failure
- G9.28 Fire alarms and adequate fire fighting equipment should be fitted and maintained in all indoor housing systems.

10 Humane killing

Objective

Where it is necessary to kill goats, it is done promptly, safely and humanely.

Standards

- | | |
|-------|--|
| S10.1 | A person in charge must ensure killing methods for goats result in rapid death or rapid loss of consciousness followed by death while unconscious. |
| S10.2 | A person killing a goat must have the relevant knowledge, experience and skills to kill the goat humanely, or be under the direct supervision of a person who has the relevant knowledge, experience and skills, unless: <ol style="list-style-type: none">1) the goat is suffering and needs to be killed to prevent undue suffering; and2) there is an unreasonable delay until direct supervision by a person who has the relevant knowledge, experience and skills becomes available. |
| S10.3 | A person in charge of a goat suffering from severe distress, disease or injury that cannot be reasonably treated or which has no prospect of recovery must ensure that the goat is killed at the first opportunity. |
| S10.4 | A person killing goats must take reasonable actions to confirm the goat is dead. |
| S10.5 | A person killing a kid by a blow to the forehead must ensure that the kid is less than 24 hours old and only when there is no firearm, captive bolt or lethal injection reasonably available. |
| S10.6 | A person must only use bleeding-out by neck cut to kill a conscious goat when there is no firearm, captive bolt or lethal injection available. |

Guidelines

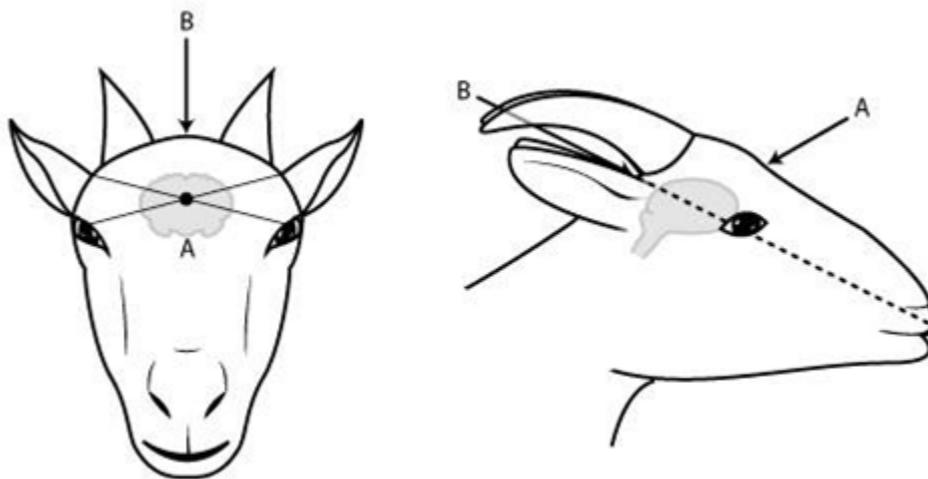
Humane destruction

G10.1 Methods of humane killing include:

- for goats over six months old should be firearm, captive bolt or lethal injection.
- for kids should be firearm, captive bolt or lethal injection.

G10.2 The poll method is the preferred method for killing goats (see Figure 10.1). The brainstem should be targeted and it lies midway along an imaginary line drawn, between the base of the ears.

Figure 10.1 Humane destruction of goats using the poll position



Note: (A) indicates the frontal method and (B) indicates the poll method. The dots indicate the point of aim and the arrows indicate the direction of aim for the positions.

The diagrams are representational and individual anatomical differences should be taken into account.

Confirming death in goat after humane killing

G10.3 Three or more signs should be observed to determine whether the method used for humane killing has caused death.

Note:

Signs of death include:

- loss of consciousness and deliberate movement including eye movement
- absence of a corneal 'blink' reflex when the eyeball is touched, or
- maximum dilation of the pupil
- absence of rhythmic respiratory movements for at least five minutes.

Firearms

Note:

Firearms energy specifications are as follows:

- The standard 0.22-long rifle cartridge means the use of any 0.22 rim-fire cartridge that produces in excess of 100 foot pounds of energy at the muzzle.

Captive bolt devices

Note:

Captive bolt use on goat is recommended to be in the crown or poll positions, accompanied by appropriate restraint and followed by an effective procedure, if necessary, to ensure death.

The captive bolt stunner should be pressed firmly on the head before being discharged, and should be positioned as described in the approved positions for goat, which are the crown and poll positions. The temporal position is not an option.

For penetrating captive bolt stunners, the cartridge power should be appropriate to the class of goat. Non-penetrating captive bolt stunners are not recommended.

Operators should make sure that charges intended for use are appropriate for the class of goat.

Captive bolts should be regularly cleaned and maintained in optimal working condition, according to the manufacturer's instructions.

Stunning by blunt trauma to the head

- G10.4 A single blow should be delivered to the centre of the forehead and should only be used on kids that are less than 24 hours old.

Bleeding out (exsanguination)

- G10.5 Bleeding out of goats without prestunning using the neck cut should only be done as a last resort using a suitable knife. The goat should be suitably restrained. The cut should transect both the carotid arteries and both the jugular veins.

Note:

Bleeding out is done by cutting the main blood vessels in the neck (neck cut). The neck cut is the only method to be used where permitted in conscious goat. Where a goat is bled out, the spinal cord should not be severed, as this can lead to intense pain until loss of consciousness ensues.

Glossary

access to water	A reasonable opportunity for goat to be able to drink water of a suitable quality and quantity to maintain their hydration.
animal welfare	The state of an animal and how well it is coping with the conditions in which it lives.
artificial breeding procedures	Includes artificial insemination, oocyte collection, embryo transfer, semen collection including by artificial vagina or electro-ejaculation, and pregnancy diagnosis on goats.
bleeding out	Loss of blood caused by cutting the major blood vessels, in the underside of the neck.
castration (castrate)	The removal or disruption of the function of the testes by excision, or by constriction and/or crushing of testicular blood supply (using a rubber ring or burdizzo clamp). <i>Notes:</i> 1. Immuno-castration is not included in this definition but is not a welfare concern. 2. For the purpose of this document, cryptorchidism is effectively considered to be castration.
class	A group of a livestock species defined by age, size, pregnancy/lactation status or sex. Lactating livestock with young at foot are considered as a single class.
construction	Nature of facilities or equipment includes the design, layout, installation, assembly of the facilities and vehicles, and the materials of which they are made.
dehorning	The surgical removal of attached horns.
direct supervision	A person (the supervised person) is acting under the direct <i>supervision</i> of another person (the supervisor) if the supervisor: (a) provides instructions and guidance to the supervised person in relation to the subject activity; and (b) oversees and evaluates the performance of the activity by the supervised person; and (c) is contactable by the supervised person; and (d) is supervising the person in accordance with paragraphs (a), (b) and (c) above; and

	(e) is on the same premises as the supervised person while the subject activity is being undertaken; and
	(f) is able to immediately render assistance to the supervised person, if required, at any time during which the subject activity is being undertaken.
disbudding	Removal of an area of skin including the horn bud in a young kid prior to solid attachment of the horn bud to the skull.
drought	A severe feed and/or water shortage following prolonged periods of abnormally low rainfall not expected in the seasonal cycles.
emergency	Where animal welfare or human safety may otherwise be compromised.
extremes of weather	Temperature and climatic conditions (e.g. rain, hail, snow, wind, humidity and heat) that — individually or in combination — are likely to predispose goat to heat or cold stress.
facilities	Fences, yards, sheds, raceways, feed and water troughs, portable yards, ramps and equipment, including kid-marking cradles, dips, sprays and jetting races.
feed on offer	Is the amount of pasture in front of an animal at any one time, (measured in kilograms of dry matter per hectare (kg DM/ha)). It is a balance between pasture growth and the removal of pasture by grazing animals.
feed pad	Part of a farm that is used for regular supplementary feeding on an area of land that is either formed, surfaced or stocked at a rate that precludes vegetation. It is generally a confined area in which feed and / or water are provided.
goat	<i>Capra aegagrus hircus</i> .
habitually	Done or experienced regularly and repeatedly or by habit.
heat stress	When the response by animals to hot conditions above their thermo-neutral limit exceeds the ability of their behavioural, physiological or psychological coping mechanisms.
inspection	The visual check of the health and welfare of goat on an individual or herd basis.
intensive production systems	An operation where goats are confined for a period longer than four weeks for the purposes of fibre, meat or milk production, and are dependent on the daily supply of feed and or water provided by human or mechanical means.
	Does not include bucks housed for breeding, stud goat in preparation for showing, goats in quarantine or goat held in a containment area.

kid	Unweaned goat under six months old.
lie	Goats are able to rest on their sternums without restriction (or contact with another goat or structures).
lift (lifted, lifting)	Lifting off the ground. Handling of the head, neck, horns, ears, tail or fibre to control or steady an animal in a supported lift or other manoeuvre, is permitted where the major effort is whole body support, and does not use one or a combination of the above body parts for the major effort.
managed goat	A goat that has been held for 10 days and/or has been subject to husbandry practices.
pain relief	The administration of drugs that reduce the intensity and duration of a pain response.
shy feeder	Goat in a feedlot that do not eat and drink sufficiently.
stud comb	Combs (e.g. stud, snow, cover, winter) which leave more wool/fibre on the animal, giving greater protection.
stun	To make an animal unconscious.
surgical procedure	Any procedure that exposes tissues normally covered by skin or mucosa.
supervision	<p>A person (the supervised person) is acting under the <i>supervision of</i> another person (the supervisor) if the supervisor:</p> <p>(a) provides instructions and guidance to the supervised person in relation to the subject activity; and</p> <p>(b) oversees and evaluates the performance of the activity by the supervised person; and</p> <p>(c) is contactable by the supervised person.</p> <p>See 'direct supervision'.</p>
trap/trapping yard	An enclosure into which goats, sheep, cattle, or wild animals are driven.
tether or tethering	The securing of an animal to an anchor point to confine it to a desired area. It is not short term tying up or hobbling.
ventilation	Natural or mechanically induced air movement sufficient to provide oxygen and remove excessive heat load and noxious gases.
weaning	Liquid feed or mother's milk is no longer provided to the kid.
wether	A castrated male goat.



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