

L a y e r H e n s

Animal Welfare (Layer Hens)

Code of Welfare 2011

A code of welfare issued under the Animal Welfare Act 1999

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National Animal Welfare Advisory Committee

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Preface

[to be inserted by NAWAC when code is Gazetted by the Minister]

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Quick reference guide to Minimum Standards

All minimum standards in this code of welfare are relevant to the housing and management of layer hens. However, the following key is provided for ease of reference. Owners and persons in charge of layer hens need to satisfy themselves that they are familiar with parts of this code that are applicable for their own circumstances, which may include parts not listed below.

Cages

A cage is an enclosure constructed of metal and holding 3-7 hens. Cages do not have perches, dust bathing areas or nest areas. They are inside a building and can be multi-tiered. They are also commonly known as current or conventional cages. The following minimum standards apply to layer hens kept in cages:

1	Stockmanship	12	Handling & Catching
2	Food & Water	13	Loading & Transport
4	Housing & Equipment Design & Maintenance	14	Management of Health & Injury
5	Stocking Densities	15	Beak Treatment
6	Lighting	16	Induced Moulting
7	Ventilation	17	Emergency Humane Destruction
8	Temperature	18	Hatchery Management & Chick Transport
11	Behaviour		

Colony systems

A colony system is a modified and enlarged enclosure with more space than cages and with perching, nesting and dusting bathing areas. It may also have an abrasive strip for claw shortening. A colony system may be referred to as a furnished or enriched cage. The following minimum standards apply to layer hens kept in colony systems:

1	Stockmanship	12	Handling & Catching
2	Food & Water	13	Loading & Transport
4	Housing & Equipment Design & Maintenance	14	Management of Health & Injury
5	Stocking Densities	15	Beak Treatment
6	Lighting	16	Induced Moulting
7	Ventilation	17	Emergency Humane Destruction
8	Temperature	18	Hatchery Management & Chick Transport
11	Behaviour		

Barns

A barn is a building housing layer hens as a single group, without access to an outdoor area but with an area for scratching. If a barn has multiple internal levels it is often referred to as an aviary, perchery and/or multi-tier system. The following minimum standards apply to layer hens kept in barns:

1	Stockmanship	11	Behaviour
2	Food & Water	12	Handling & Catching
4	Housing & Equipment Design & Maintenance	13	Loading & Transport
5	Stocking Densities	14	Management of Health & Injury
6	Lighting	15	Beak Treatment
7	Ventilation	16	Induced Moulting
8	Temperature	17	Emergency Humane Destruction
9	Litter Management	18	Hatchery Management & Chick Transport

Free range

A system of housing hens that provides access to an outdoor area. The housing can be either fixed or moveable, is similar to a barn (including aviary, perchery or multi tier) without cages. The following minimum standards apply to layer hens kept in free range systems:

1	Stockmanship	10	Range Management
2	Food & Water	11	Behaviour
3	Shelter	12	Handling & Catching
4	Housing & Equipment Design & Maintenance	13	Loading & Transport
5	Stocking Densities	14	Management of Health & Injury
6	Lighting	15	Beak Treatment
7	Ventilation	16	Induced Moulting
8	Temperature	17	Emergency Humane Destruction
9	Litter Management	18	Hatchery Management & Chick Transport

1. Introduction

What is the purpose of this code of welfare?

This code sets the minimum standards for the care and management of layer hens under all forms of management used in New Zealand. The purpose of this Code is to provide guidance to the owners of layer hens and to persons who are in charge of them about the standards they must achieve in order to meet their obligations under the Animal Welfare Act 1999.

Good welfare of layer hens relies on a combination of good practice in stockmanship, design, maintenance and management of facilities, and choice of hen genetics to suit conditions and requirements. Hens have physical, health and behavioural needs that must be met, regardless of the production system employed, if their welfare is to be maintained. This code provides for the gradual phase-out of systems that do not allow these needs to be met.

This code includes information and example indicators for each minimum standard. The list of indicators is not exhaustive but is given to provide guidance on ways in which a minimum standard may be met.

This code also includes recommendations for best practice to encourage standards of care over and above the minimum.

Who does this code apply to?

This code is intended for all persons responsible for the welfare of layer hens. Under the Act the “owner” of an animal and every “person in charge” of an animal is responsible for meeting the legal obligations for animal welfare. In practice, the identification of the person in charge will depend on the minimum standard in question.

The owner of the hens may place them in the care of others for purposes such as feeding and management, rearing, transport and slaughter. However, this does not absolve the owner of their responsibility to ensure that these tasks are carried out in accordance with this code.

Some Minimum Standards are more general and describe welfare outcomes for birds. Others are more prescriptive and specify how these outcomes should be achieved. The more prescriptive standards are designed to remove uncertainty and ambiguity for the owner in identifying good welfare practice. It is the responsibility of the owner to take account of both outcomes and prescribed actions in the Minimum Standards and act accordingly.

What animals does this code apply to?

This code applies to all layer hens (as defined in Appendix I: Interpretation and Definitions) regardless of the management system under which they are kept, from the time chicks are in the last half of development before they hatch (which has relevance to the sale of embryonated eggs), through to the catching and transport of chickens at the end of the laying cycle. It also applies to roosters.

What happens if I do not follow the minimum standards in this code?

Failure to meet a minimum standard in this code may be used as evidence to support a prosecution for an offence under the Animal Welfare Act. A person who is charged with an offence against the Animal Welfare Act can defend him or herself by showing that he or she has equalled or exceeded the minimum standards in this code.

Example indicators provided with minimum standards do not have a legal effect and when determining whether a minimum standard has or has not been met, all relevant factors are taken into account, including the current state of scientific knowledge, technology and good practice, as well as the environment and individual circumstances of the animals concerned.

The recommendations for best practice in this code have no legal effect. They are included to encourage higher standards of animal welfare.

How does this code relate to other codes?

Other codes of welfare may also be relevant to layer hen welfare and should be consulted where appropriate (see Appendix V, “Codes of Welfare”, to this code and the Ministry of Agriculture and Forestry website at: www.biosecurity.govt.nz/animal-welfare/).

2. Stockmanship

Introduction

The importance of good stockmanship cannot be over-emphasised. The care of layer hens, at whatever stage of production, requires experience and high standards of performance.

Those responsible for the care of layer hens must be competent, well trained and work at least to the minimum standards required by this Code of Welfare. Personnel should be appropriately trained and instructed in the care and maintenance of layer hens and how their actions may affect the hens' welfare.

Knowledge by stock handlers of the normal appearance and behaviour of layer hens is essential for their ongoing health and welfare. It is important that those in charge of layer hens are able to recognise early signs of distress or disease so that prompt action is taken or advice sought. It is common industry practice that there are separate rearing and production phases with personnel who have specific knowledge relating to each phase.

Those in charge of layer hen operations must ensure that their personnel, including contract or temporary staff have either the relevant knowledge and training, or appropriate supervision by trained and competent people, to ensure that the health and welfare needs of the hens in their care are met.

Minimum Standard No. 1 – Stockmanship

- (a) Layer hens must be cared for by personnel who possess the appropriate ability, knowledge and professional competence to maintain their health and welfare in accordance with the Minimum Standards listed in this Code.**
- (b) Staff must be suitably trained in emergency response e.g. fire evacuation.**

Example indicators for Minimum Standard No. 1 – Stockmanship

- Animals are maintained in accordance with requirements of this code.
- Operational procedures are documented and implemented.
- Documentary evidence of staff training/competence is maintained.
- Personnel have an understanding of the code of welfare and their obligations.
- There is evidence of staff trained in emergency response capabilities e.g. fire evacuation.

General Information

Quality assurance programmes, e.g. Risk Management Programmes (as per the Animal Products Act), emphasise the importance of training of personnel.

The Agriculture Industry Training Organisation lists a number of training qualifications for those involved in the poultry industry <http://www.nzqa.govt.nz/framework/>

Additional information can be found on the industry website www.eggfarmers.org.nz

3. Food and Water

Introduction

Food and water are essential for maintaining good layer hen welfare. Nutrient composition, feed availability, quantity of feed, absence of contaminants in the feed and water, and access to the feeders and drinkers are all-important features. Requirements for the quality and composition for the feed supplied to layer hens are mandated under the Agricultural Compounds and Veterinary Medicines Act 1997.

Minimum Standard No. 2 – Food and Water

- (a) All layer hens must receive adequate quantities of food and nutrients each day to enable them to:
 - (i) maintain good health;
 - (ii) meet its physiological demands; and
 - (iii) avoid metabolic and nutritional disorders.
- (b) All layer hens must have continuous access to water that is sufficient for their needs, palatable and not harmful to health.
- (c) Food and water must be provided in the following ways to prevent undue competition and injury:
 - (i) Linear feeders providing at least 10cm of space per hen or circular feeders providing at least 4cm of space per hen.
 - (ii) Either continuous drinking troughs providing at least 2.5cm of space per hen or circular drinking troughs providing at least 1cm of space per hen.
 - (iii) Where bells, nipple or cup drinkers are used, hens in cages must have access to at least two nipples or cups. In other housing systems a minimum of 1 bell per 100 hens or 1 nipple or cup per 10 hens must be provided.
- (d) Undersized or cull hens that cannot access food and water adequately must be removed during daily inspections, and raised separately or humanely euthanased immediately.
- (e) Feed must not be withheld for more than 24 hours prior to slaughter.
- (f) Water must be provided until the time of depopulation.

Example indicators for Minimum Standard No. 2 – Food and Water

- Feed quality and composition meet the standards of the New Zealand Feed Manufacturers Association *Manufacture of Animal Feeds in New Zealand Code of Practice*.
- Feed particle size is appropriate for the age and size of the hens.
- Representative samples of hens in the same age group per shed are weighed on a regular basis, or body condition monitored (eg by feeling keel).
- Corrective action is taken if the average sample weight is more than 10% less than the

previous weighing (information on weights for breeds of hens can be obtained from breeding companies or avian veterinary services).

- Water derived from sources not subject to local authority control are shown to be potable and tested for microbiological contamination every six months.
- Daily feed and water intakes align with breeder recommendations for age of stock.
- Feed nutrients are checked promptly if more than 10% of hens display negative behaviours (e.g. feather pecking, cannibalism).
- Feed and water mechanisms and availability are monitored on a daily basis.

Recommended Best Practice

- (a) Uncontrolled permanent water sources (e.g. open stock troughs, creeks) that are used as major drinking water sources should be monitored for microbiological quality and palatability at a frequency dependent on test results.
- (b) Provision of insoluble grit is beneficial for the hens' digestive system and this should be provided at level appropriate to the hen's age from 3 weeks old. Suitable advice on appropriate levels can be obtained from breeder recommendations.
- (c) Hens should have food withheld for 3 – 6 hours prior to loading for transport. (Note Minimum Standard 2f requires water to be provided at all times.)

General Information

“Midnight feeding” is sometimes used for the management of hens needing to increase feed intake. See Minimum Standard 5, below.

Hens sometimes have water withheld for a short period of time to promote drinking to ensure uptake of water-based vaccines.

4. Shelter and Shade

Introduction

Provision of shade and shelter is important for protecting hens from environmental extremes and may be provided by the main building that is used to house hens, or by additional, purpose-built shelters. Research has shown that shade and shelter, such as trees, shrubs or artificial structures, are important in encouraging hens in free range systems to fully utilise the outside area. In cases where such shade or shelter has not been provided for free range hens, the hens make the most of the outside area at dawn and dusk (ie, when the risk of aerial predation is low).

Minimum Standard No. 3 – Shelter

- (a) All hens must have access to shelter from adverse weather that is likely to cause heat or cold stress, and to manage the risk of predation.
- (b) At least 4m² per 1000 hens of natural or artificial shade or shelter must be provided on the range, evenly distributed at a distance of 30 to 50m from the perimeter of the housing facility.

Example indicators for Minimum Standard No. 3 – Shelter and Shade

- Free range hens are observed to use the outside range regularly.
- Hens experiencing either heat stress (panting, wings outstretched) or cold stress (huddling) are rarely observed.
- Protection from predators and pests is implemented.
- Overhead shade or shelter is provided on the range at all times throughout the year in free range systems.
- Windbreaks are evident in exposed areas on the range.

Recommended Best Practice

- (a) A variety of shade and or shelters e.g. shelter trees, covered sand baths, fallen tree branches, or straw bales should be provided throughout the range area to encourage the hens to use the whole of the range area and feel safe to move away from the perimeter of the housing facility.

General Information

Shade and shelter provision for free range hens is also an integral part of range management covered in Minimum Standard 9.

4.1 Housing and Equipment Design, Construction and Maintenance

Introduction

Provision of appropriate housing, including the indoor area of free range production systems and other facilities, is essential for the health and welfare of layer hens.

Minimum Standard No. 4 – Housing and Equipment Design, Construction and Maintenance

- (a) All housing and equipment, including shelters used outside in free range systems and mechanical equipment, must be designed, constructed and maintained to avoid injury, disease or harm to layer hens.
- (b) Housing must be sited to facilitate drainage of storm water away from buildings and to minimise risks posed by natural and environmental hazards.
- (c) Precautions must be taken to secure the site and buildings against unauthorised entry of people, to protect the health and welfare of the hens.
- (d) Measures must be taken to control pests in and around hen housing and shelters.
- (e) Housing facilities must have suitable fire fighting equipment and a documented emergency plan to be followed in the case of fire.
- (f) Housing for hens, with the exception of cages, must provide facilities for roosting (e.g. perches), litter material for pecking and scratching, and a discrete nesting area.
- (g) All housing systems must be constructed and maintained to allow removal of hens at depopulation in a way that avoids injury.
- (h) All housing systems must be designed to allow hens to maintain a natural posture throughout and to stretch to their full height.
- (i) Controlled environment housing must have alarms that warn of power failure and/or significant temperature variance and have a back-up power supply capable of maintaining ongoing environmental control.
- (j) Perches must be positioned to minimise fouling of other hens and drinkers and feeders.
- (k) The design and size of the openings and doors of housing systems must be such that hens can be placed in or removed from them with minimal risk of injury or distress.
- (l) The following specific design requirements apply, according to housing system:

Cages:

- (i) Multi-deck cages must be arranged so that the layers hens in the lower tiers are protected from excreta from above.
- (ii) Manure must be removed from under the cage before it touches the cage floor.
- (iii) All cages for layer hens must have:
 - A floor slope of not exceeding 8 degrees that supports the forward facing claws.
 - A cage height of at least 40cm over 65% of the cage floor area and not less than 35cm at any point.
 - Access for each layer hen to at least two drinking points.

Colony Systems:

- (i) The floor of the nest area must be covered with a suitable substrate that prevents direct contact of hens with the wire mesh floor.
- (ii) A floor slope not exceeding 8 degrees that supports the forward facing claws.
- (iii) A colony height of at least 45cm other than in the nest area.
- (iv) A minimum aisle width of 90cm between tiers of colonies, and a space of at least 35cm between the floor of the house and the bottom tier of colonies to

aid inspection, installation and depopulation.

- (v) Suitable perches that provide at least 15cm of space per hen and allow the hen to grip without risk of trapping its claws.
- (vi) Suitable claw shortening devices must be fitted.

Barns:

- (i) Suitable perches providing at least 15cm of space per hen and with a horizontal distance between the perches of at least 30cm and between the wall and the perch of at least 20cm, to allow the hens to grip without risk of trapping their claws.
- (ii) Perches designed to prevent the fouling of hens or their food on lower levels and of a height that allows hens to use them easily and without risk of injury.
- (iii) For multi-tier systems there must be no more than 4 levels or tiers, with headroom between the levels of at least 45cm.
- (iv) The levels designed so that the droppings do not fall on the levels below.
- (v) Feed and water provision is evenly distributed on all levels to provide access for all the hens.
- (vi) At least 1 nest is provided per 7 hens or, for group nests, at least 1m² of nesting space is provided per 120 hens to ensure hens can nest without undue competition.
- (vii) Wire nest floors must be covered by a suitable substrate e.g. plastic matting, artificial turf or straw, so that the hen is not in direct contact with the wire.
- (viii) At least 250cm² of litter substrate must be provided per hen e.g. for 1000 hens an area of 25m² is needed to encourage pecking, scratching and dust bathing behaviours
- (ix) Any slatted, wire or perforated floors must be constructed to support the forward facing claws.

Free Range:

- (i) Housing requirements as for Barns.
- (ii) Free range houses that incorporate a covered veranda, and where the floor space of this area is part of the whole floor space calculation for the hens, must have continuous access for the hens between this area, and the inside of the house.
- (iii) Access points to the outdoor area must be designed to minimise the adverse effects of the weather on the hens and the litter.
- (iv) The openings to the outdoor area or between the covered veranda and the housing facility must be at least 35cm high and 40cm wide, and evenly distributed along each side of the building, providing a total opening of 2m per 1000 hens, to allow hens free access without risk of smothering or injury.

Example indicators for Minimum Standard No. 4 – Housing and Equipment Design and Maintenance

- Provisions are in place to control personnel accessing the premises
- There is a visitor access recording system
- Pest control is implemented and documented
- Environmental parameters of the housing system are in accordance with the Minimum

Standards for Lighting, Ventilation, and Temperature

- Operation of equipment is monitored on a daily basis and corrective action is taken promptly and documented
- There is documented evidence of routine cleaning of the facilities and equipment so that transmissible diseases / parasites are avoided or managed
- There is documented evidence that alarms have been checked and tested at least monthly and problems immediately rectified
- There is documented evidence of preventative maintenance in place for facilities and equipment
- Perches are of a design and construction (including height and spacing) that minimises injury (such as keel damage) or ill-health (such as foot problems)
- Where injury, pain or distress is observed that has been caused by a failure or fault in housing or equipment (eg damaged flooring), the failure or fault is immediately rectified
- Emergency management plan outlines actions to take in event of power failure
- Cages units are secured to the floor to prevent toppling.

Recommended Best Practice

- (a) Openings to the range and or covered veranda should be a minimum of 1 m wide and 45cm high.

General Information

Perforated floors can be considered as perching space when they have perches incorporated within the floor structure or attached on top of the floor surface.

5. Facility management

5.1 Stocking Densities

Introduction

Stocking density cannot be considered in isolation from other minimum standards as it is inter-related with food and water availability, environmental controls, housing system design, hen behaviour and active range management policies. The stocking density compatible with acceptable welfare of the hens is dependent on good stockmanship and management of all environmental factors so that hens do not have to compete for their food, water, perches, or access to an outdoor area.

Consideration of the outdoor stocking level needs to take into account factors such as soil type, drainage, size of colony and frequency of flock rotation e.g. a heavy, poorly drained soil can carry fewer hens than land that is light and well drained.

Minimum Standard No. 5 – Stocking Densities

- (a) Hens must be stocked at densities not exceeding the following, or provided with the following space per bird:

	Hens per sq m (maximum)	Sq cm per hen (minimum)
Pullets 7 – 18 weeks of age (inclusive)		
Cages and colony systems	27	370
Floor	14	724
Layer hens 19 weeks of age and older		
Cages built prior to 1 January 2005	20	500
Cages built from 1 January 2005	18	550
All laying cages from 1 January 2014	18	550
Colony systems	13	750
Barns	7	1428
Free range systems – houses	10	1000

- (b) Stocking of the outdoor ranging area in free range systems must not exceed 2,500 hens per hectare or must provide at least 4m² per hen.

Example indicators for Minimum Standard No. 5 – Stocking Densities

- Distribution and behaviour of birds using the facilities is monitored.

5.2 Lighting

Introduction

The management of light is an integral part of ensuring hen health and welfare, especially in preventing or reducing feather pecking and cannibalism. It can also be used to encourage certain hen behaviours e.g. higher light levels on the litter area can encourage hens to dust bath and lower levels over the roost areas can encourage hens to rest. Lower light at the nests encourages the hens to use the nests.

Minimum Standard No. 6 – Lighting

- (a) Chicks must be provided with light of at least 20 lux for at least the first 7 days so they can easily locate food and water.**
- (b) Chicks and pullets housed in artificial light must be exposed to short periods of darkness after placement, in order to train them to blackout conditions should lighting fail.**
- (c) After the training period, where hens are housed in artificial light, lighting schedules must provide a minimum of eight hours of continuous darkness in each 24-hour period.**
- (d) Lighting levels during the light phase must not be lower than 5 lux at ground level so that chickens can see one another and their surroundings.**
- (e) Light levels during inspections must be sufficient to stimulate activity of the hens and allow hens and equipment to be inspected.**
- (f) Where hens are kept without access to natural light, the light intensity must be raised and lowered gradually over a 15-minute period to give them sufficient time to roost and come off perches without causing injury.**

Example indicators for Minimum Standard No. 6 – Lighting

- Lighting pattern(s) used are documented and follow breeding company guidelines.
- Light control systems are working and are well maintained
- Light levels during inspection are sufficient to ensure that all hens in all parts of the house are clearly visible.
- Natural and artificial lighting are evenly distributed to facilitate the distribution of the hens over the floor area and avoid overcrowding.
- Light levels during the light period are above 5 lux at hen level at all times.

General Information

At certain times of the year, hens that are exposed to natural light may experience day-lengths longer than the limit required by Minimum Standard 5(c) above (which applies to hens kept under artificial light).

Use of coloured lights e.g. red, blue or green can be beneficial in reducing the incidence of cannibalism and feather pecking.

5.3 Air Quality and Ventilation

Introduction

Ventilation provides fresh air, and assists in the control of temperature, humidity, noxious gases (e.g. ammonia, methane, carbon dioxide, carbon monoxide), dust and other airborne particles and litter quality. The accumulation of water vapour, heat, noxious gases and dust particles may cause discomfort or distress to the hens and predispose them to the development of health problems.

Air humidity is determined by both external ambient conditions and factors within the shed such as stocking density, liveweight of the hens, ventilation rate, indoor temperature, functioning of technical equipment and litter quality (where this is relevant).

Ammonia problems are more likely to occur in early morning and periods of high humidity such as winter.

Dust is a potentially harmful air contaminant, particularly in combination with ammonia and other gases. It may directly affect the respiratory tracts of chickens and also act in the transmission of infections.

There is a relationship between ventilation, temperature, litter quality and management, and stocking density, which has an impact on hen health and welfare.

Minimum Standard No. 7 – Ventilation

- (a) Ventilation must be sufficient to prevent the build-up of heat, humidity, dust and noxious gases to levels that are harmful to hen health or that cause pain or distress to hens.**
- (b) Immediate remedial action must be taken if ammonia levels greater than 25ppm are detected at hen level, or if hens exhibit signs of heat stress, respiratory distress or distress from humidity, dust or noxious gases.**

Example indicators for Minimum Standard No. 7 – Ventilation

- There are minimal signs of discomfort, distress or disease (e.g. panting and wing stretching if hot, huddling if cold, sneezing) on at least once a day inspection
- Eye and nasal irritation indicative of ammonia level over 25 ppm are not detected by stock handlers during daily inspections

Recommended Best Practice

- (a) Air quality parameters such as ammonia should be monitored and recorded on a weekly basis

General Information

Ventilation has to be considered alongside other minimum standards such as temperature and stocking density, as they all inter-relate. Stock persons need to be able to recognise bird behaviour changes and act accordingly to ensure good welfare and bird health is not compromised e.g. increase the ventilation rate if the birds are panting due to high temperatures and review nutrition and feeding times to reduce heat stress.

5.4 Temperature

Introduction

Temperature requirements for layer hens vary considerably from day-old to end-of-lay and must be managed in response to changing requirements.

Newly hatched chickens have limited ability to maintain adequate body temperatures and thus additional heat input is required to maintain the temperature of the brooding area at a minimum of 30°C. Thereafter the temperature can be progressively reduced to provide a comfort level for the chicken appropriate to its age.

Temperature is affected by ventilation and in turn affects litter quality.

Minimum Standard No. 8 – Temperature

- (a) Temperatures inside housing must be maintained within a range compatible with good health and welfare of the hens.**
- (b) When chickens show signs of being too cold or too hot, remedial action must be taken immediately.**
- (c) The brooder area for newly placed chicks must be pre-heated and the temperature maintained at a level that promotes good chick health and welfare.**

Example indicators for Minimum Standard No. 8 – Temperature

- Temperature at the level of the chickens is within the temperature range specified in the breeding company guidelines, as appropriate for the age and breed of the hens
- Corrective action is taken if signs of stress (sneezing, prolonged panting and wing extension due to heat or huddling due to cold) are observed during daily inspection
- Temperatures and chicken behaviour is monitored more frequently when ambient temperatures are extreme and corrective action is taken if required
- Chick behaviour and distribution within the brooding area is monitored and remedial action is taken as required.

Recommended Best Practice

- (a) Temperature readings for housed hens should be monitored and recorded and should follow breeding company guidelines.

General Information

There is an inter-relationship between temperature, ventilation and stocking density. Stock persons have to be competent at reading bird behaviours and acting accordingly e.g. increasing ventilation rate if birds are panting due to heat stress.

5.5 Litter management

Introduction

Litter management is a key part of managing the welfare of barn and free range hens so that problems such as dust, fungal proliferation, and illness or diseases such as hock burn or respiratory disease are minimised.

Key features of litter management are control of the quality, type and depth of the litter used, moisture (including the way water is provided), temperature, ventilation, feed type and quality and stocking density.

There is a close relationship between maintaining litter in good condition and the management of air quality in the shed.

Minimum Standard No. 9 – Litter Management

- (a) Litter material, when first introduced, must be of good quality, friable and free from toxic contaminants.**
- (b) Litter condition must be managed to avoid levels of dustiness or dampness that could cause leg, respiratory or other health problems, such as the build-up of parasites or diseases.**

Example indicators for Minimum Standard No. 9 – Litter Management (Barn & Free Range Systems)

- There is evidence of dust bathing behaviour
- Plumage and feet of chickens are in good condition and are monitored regularly
- Litter inspected regularly for signs of caking or greasiness
- Litter is obtained from reputable sources and visually inspected before use
- Wood shavings are dry, from non-treated timber and free from toxic contamination
- Litter is used for one laying cycle only.
- Drinkers are managed to avoid leaks or spillage leading to wet litter

Recommended Best Practice

- (a) Litter depth should be maintained at a minimum depth of 10cm built up over the first few months of use.

General Information

The optimum minimum depth of litter depends on the choice of litter material. Litter in free range systems needs to be especially carefully managed in winter when temperatures are low and litter is likely to become wet. Stock persons should be aware of the factors that affect litter condition and be aware of the welfare problems associated with poor litter management.

5.6 Range management

Introduction

Maintenance of good conditions on the range is essential for the health and welfare of the free range hen.

Hens are fearful of wide open spaces and so providing and managing the shade and shelter on the range encourages its use and allows the hens to display a wider range of natural behaviours.

If hens are afraid to use the range this may increase stress inside the shed and can lead to negative behaviours such as aggressive feather pecking. Research shows that providing a variety of shade and shelter is beneficial, particularly natural shelter from trees and shrubs positioned to encourage the hens to move away from the house perimeter.

Minimum Standard No. 10 – Range Management

- (a) **The outdoor area in free-range systems must be managed actively to ensure that the ground conditions and vegetation are not harmful to the health and welfare of the hens.**
- (b) **The area immediately around the house must be managed using materials such as stones, bark, slats or mesh to prevent the ground becoming wet and muddy and to help to keep the hens' feet clean and minimise parasite build up in this area.**
- (c) **A range management plan must be in place that addresses pasture quality, vegetation, and control of parasites and diseases.**
- (d) **Access to the range must be available during daylight hours and at least for a minimum of 8 hours, unless prevented by bad weather or veterinary advice.**

Example indicators for Minimum Standard No. 10 – Range Management

- Minimal evidence of pugging, standing water and muddy, dusty or contaminated conditions
- Vegetation does not contain harmful species (toxic plants / weeds) or contaminants
- A system of rotation of grazing or house movement is in place that takes account of the type of soil, drainage and flock size
- Rotation of artificial shelters takes place
- Surface tilling or liming of the soil is undertaken to help control parasite build up
- Access is restricted to muddy/pugged areas to allow vegetation to re-grow
- Vegetation on the range is maintained in good condition
- Hens are prevented from accessing the range if weather conditions or veterinary advice preclude it

Recommended Best Practice

- (a) Range enhancement e.g. trees, shrubs, covered shelters, straw bales should be used to encourage hens to move away from the pop holes and house perimeter.

- (b) The shape of the range should be wide, rather than a narrow area, to help manage range quality outside the pop holes

General Information

In free-range systems, the time taken for land to become contaminated depends upon the type of land, stocking density and weather patterns.

The ground around permanent houses in free-range systems can be protected with slatted platforms, covered verandas, areas of gravel or other suitable methods, to avoid it becoming contaminated and muddy.

To prevent paddocks becoming muddy to an extent that could be harmful to the birds' health, a number of management techniques should be used which may include the rotation of flocks in separately fenced paddocks.

6. Behaviour

Introduction

The opportunity for layer hens to show normal behaviour in the farm environment is an important welfare consideration that the Animal Welfare Act requires of owners and persons in charge. There is evidence that certain priority behaviours are more important to hens than others. These are:

- Standing erect over all of the available floor space;
- Extending and flapping their wings;
- Laying their eggs in a discrete nesting area;
- Perching;
- Scratching a surface and exhibiting foraging and dust bathing behaviours (sham dust bathing is an acceptable alternative).

At different times, the priorities among these behaviours may change. For example, pre-laying and nesting behaviour is the highest ranked priority as hens approach the time to lay their eggs, and hens place a high value on a nest site, and rank this a higher priority over food.

It is up to owners and persons in charge to ensure hens are able to show these priority behaviours, regardless of the housing system that they employ.

NAWAC call for comments:

NAWAC considers that the use of layer hen cages providing less than 750 sq cm per hen and no perches, discrete nesting areas or scratching surfaces, does not fully meet the obligations of the Act. Minimum Standards 11 (b) and (c) provide for a transition from current practice to colony systems and loose-housing systems.

Section 73(3) of the Animal Welfare Act 1999 provides that the National Animal Welfare Advisory Committee (NAWAC) may, in exceptional circumstances, recommend minimum standards that do not fully meet the obligations to ensure that the physical, health and behavioural needs of the animal are met. In making this recommendation NAWAC must have regard to, among other things, the feasibility and practicality of effecting a transition from current practices and any adverse effects that may result from such a transition, and the economic effects of any transition from current practices to new practices.

The letter attached to this draft code of welfare specifically invites comment on options for transition to alternative housing systems. Minimum Standard 11 in this code of welfare and (if necessary) other affected Minimum Standards in this code, will accordingly be amended in light of the submissions received and other factors that the Animal Welfare Act 1999 requires NAWAC to consider.

Minimum Standard No. 11 – Behaviour

- (a) Chicks, pullets and layer hens must be housed and managed in a manner that provides them sufficient opportunities to express their priority patterns of behaviour. For layer hens, these are: standing erect over all available floor space, extending and flapping the wings, laying eggs in a discrete nesting area, perching,**

and expressing foraging and dust bathing behaviour.

- (b) Existing housing systems that do not satisfy the requirements of this Minimum Standard must be replaced with compliant systems by 20XX [see note above].
- (c) Any new facilities to house layer hens constructed after the date of issue of this code must meet the requirements of this Minimum Standard.

Example indicators for Minimum Standard No. 11 – Behaviour

- Layer hens show types and frequencies of activities that are normal for their age.

Recommended Best Practice

- (a) Pullets reared for barn and free-range systems should be reared with access to the floor and perches from 6-18 weeks of age, to aid familiarisation with the laying system.

General Information

Systems that do not meet the purposes of the Animal Welfare Act cannot be provided for in codes of welfare, unless there are exceptional circumstances to allow them. This minimum standard allows for the phasing out of housing systems that do not meet the purposes of the Act because they do not allow hens to show these normal behaviours.

The minimum standards and associated suggested indicators outlined elsewhere throughout this code are also intended to ensure that housing and management allows the behavioural needs of layer hens to be met, and provide advice on how these needs can be met.

NAWAC is relying on the application of section 73(3) of the Animal Welfare Act in order to recommend the use of housing systems that do not meet the purposes of the Animal Welfare Act, until the date that will be given in Minimum Standard 11(a).

7. Handling and Husbandry Procedures

7.1 Handling & Catching

Introduction

Minimisation of undue stress and the avoidance of injury are key considerations whenever layer hens are being handled. Competent handling of layer hens is essential for their proper husbandry. Distress and risk of injury to both the hens and their handlers are decreased when good handling practices are followed. Reducing fear by keeping hens calm makes them easier to handle. Careful handling during the catching of end of lay hens, which may have reduced bone strength, is especially critical at the time of depopulation to minimise risk of injury to the hen.

Minimum Standard No. 12 – Handling and Catching

- (a) Hens must be handled at all times, including all stages of the catching procedure, in a manner that minimises the risk of pain and distress and avoids injury.
- (b) Layer hens must not be picked up or suspended by one leg.
- (c) No more than four hens must be carried in each hand.
- (d) Stress of handling, especially at depopulation, must be minimised by appropriate design of the facilities,.
- (e) All members of the catching team must be suitably trained in the handling of layer hens, and a nominated member of the catching team must be responsible for supervising, monitoring and maintaining high welfare standards throughout the catching process.
- (f) Hens that are recognised as injured during the catching procedure must be humanely destroyed immediately.

Example indicators for Minimum Standard No. 12 – Handling and Catching

- Injuries attributable to handling are rare
- There is evidence of training for catching crews.
- Any injured or unfit hens identified during the catching process are immediately and humanely destroyed.
- A documented depopulation action plan is completed by the farm manager which outlines the catching plan, including: minimising the manual handling of the hens, minimising problems of uneven flooring or other hazards, ease of access into and out of the shed when carrying hens, use of transport trolley's with drawers that can be used in the shed aisles, use of catching frames, penning loose-housed hens into small groups to minimise risk of crowding and smothering, plans for dealing with any loose birds, provision of adequate facilities for the catching team.

Recommended Best Practice

- (a) Manual handling of hens should be kept to a minimum during stocking and depopulation.

General Information

Research has shown that manual handling of the hens during stocking and depopulation can compromise their physical, physiological and behavioural wellbeing. Therefore if systems can be developed that minimise handling and catching procedures, this will be beneficial for hen welfare.

7.2 Loading and Transport

Introduction

Transport systems must be designed and managed to ensure chickens are not caused unnecessary distress or discomfort. The transport and handling of chickens must be kept to a minimum. Personnel involved in transport must be thoroughly trained and competent to carry out the tasks required of them. Contingency plans should be in place to deal with events such as vehicle breakdowns, adverse weather and transport delays to ensure that the thermal comfort of the different age groups are not compromised and transport stress is minimised.

When it is issued, the Animal Welfare (Transport within New Zealand) Code of Welfare will apply to the transport of hens.

Minimum Standard No. 13 – Loading and Transport

- (a) Persons responsible for the loading and transport of hens must be suitably trained in careful handling procedures and understand the effects poor transport conditions may have on the welfare of the hen.**
- (b) Hens must be placed in the transport crates in a manner that allows them to rapidly regain an upright position**
- (c) Crates and containers must be constructed to ensure there are no hazards likely to cause injury to the hens.**
- (d) Crate height for hens must be at least 21 cm, with minimum floor space of 175 cm² per kg**
- (e) Conveyances and containers must have sufficient ventilation, even when stationary, to prevent the build-up of concentrations of gases or water vapour harmful to the hens.**
- (f) Consignors, consignees and persons in charge of hens must have contingency plans to address potential transport problems. Drivers of vehicles must be properly briefed on any contingency plan.**
- (g) Crates and transport vehicles must protect the hens from climatic conditions that would compromise their welfare.**

Example indicators for Minimum Standard No. 13 – Loading and Transport

- Documented records of hens injured or dead on arrival
- Hens are transported in an upright position - sitting not standing
- Free flow of air occurs for all hens
- Documented training record for loading and transport crews
- Documented contingency plan is evident
- Documented record of nominated supervisor is evident

- Compliance with Animal Welfare (Transport within New Zealand) Code of Welfare is evident

Recommended Best Practice

- (a) Thermal comfort zones for pullets and layer hens during transport within a container should be within an upper limit of 26⁰C and lower limit of 8⁰C, and assume a space allowance of 180-200cm² / bird and journey duration no greater than 12 hours.

General Information

Poor feathering and depressed metabolism due to prolonged feed withdrawal combined with a long transport time may make end-of-lay hens excessively susceptible to the effects of cold and/or wet weather, particularly at high air speeds. However, during warm weather if the transport vehicle is over-protected and/or stationary for prolonged periods this may result in heat stress and related mortality.

8. Health

8.1 Disease and Injury Control

Introduction

There is a relationship between the health and welfare of layer hens and disease control is an integral part of hen welfare. Appropriate methods to prevent and control disease in layer hens include the use of vaccination and preventative medication programmes, ensuring that good levels of hygiene are maintained and that appropriate biosecurity measures are employed.

All persons responsible for the care and management of poultry need to be competent to recognise signs of ill-health. Signs may include a reduction in feed and water intake, reduced rate of body weight gain, changes in the colour and/or consistency of faeces, increases in odour and changes in appearance, activity or behaviour, or increase in mortality.

Minimum Standard No. 14 – Management of Health and Injury

- (a) A detailed inspection of all hens must be undertaken at least once a day and steps taken to address any abnormalities in the flock.**
- (b) Mortalities, including culls, must be monitored and recorded and dead hens removed from the flock daily.**
- (c) Hens recognised in the flock as having ill-health or debility must be removed and treated or killed by a humane method as soon as possible.**
- (d) Medication must be used only in accordance with registration conditions, manufacturers' instructions or professional advice.**
- (e) If the early signs of a disease outbreak are recognised or suspected or mortalities are greater than expected, then appropriate intervention must be undertaken by a suitably qualified person.**
- (f) Premises and equipment must be thoroughly cleaned and disinfected before restocking to prevent the carry over of disease-causing organisms to incoming hens.**

Example indicators for Minimum Standard No. 14 – Management of Health and Injury

- Dead hens and culls are removed daily and numbers recorded,
- Disease outbreaks, health problems and remedial action are documented.
- Abnormal conditions are noted, the cause identified and appropriate remedial action taken.
- Regular assessments of the risk of infectious and parasitic diseases are made and appropriate control systems are in place to prevent them.
- Persons responsible for the welfare of hens have an understanding of good farm biosecurity measures and some appreciation of the signs of notifiable diseases e.g. Avian Influenza, Newcastle Disease and what actions they need to take if concerned.
- Sufficient inspections are undertaken during which temperature, light levels, availability of feed, feeding systems, water and all air vents are checked, and where problems are encountered, appropriate remedial action is taken to protect the welfare of the hens.

Recommended Best Practice

- (a) The layer hens should be under the care of a specialist poultry veterinarian and a health plan should be documented and in place.

8.2 Beak Treatment

Introduction

Feather pecking and cannibalism may occur in any layer hen system. The incidence of cannibalism and feather pecking can be reduced by management strategies including beak treatment, reducing light levels or using coloured lights e.g. red or blue lights.

Infrared beam beak treatment (IRBT) is now the standard practice for the commercial hatcheries in New Zealand. It is carried out on day old chicks, and its precision and accuracy minimises welfare issues for the hens

Minimum Standard No. 15 – Beak Treatment

- (a) Beak treatment must only be carried out by competent, trained operators.
- (b) Beak treatment, when undertaken, must occur within 10 days of hatching using an infrared beam.
- (c) The treatment of beaks of individual hens after 10 days of age may be undertaken in an emergency with veterinary approval and under veterinary supervision to help control outbreaks of cannibalism during the laying period.
- (d) The operator must not remove more than one-quarter of the upper or lower beaks. This means for:
 - (i) day-old chicks, no more than 2mm of the beak;
 - (ii) 10 day-old chickens, no more than 3mm of the beak; and
 - (iii) adult hens, no more than the blunting of upper and lower mandible tips.

Example indicators for Minimum Standard No. 15 – Beak Treatment

- Infrared treatment is undertaken in accordance with supplier instructions
- Records of veterinary approval and supervision can be provided where heat cauterization beak treatment is undertaken
- Inspection of beaks is undertaken to ensure minimum amount removed.
- Staff training records are documented.

Recommended Best Practice

- (a) Alternative strategies for managing injurious feather pecking that minimise the need for beak treatment should be employed e.g. use and availability of different enrichment stimuli.

General Information

There is genetic research ongoing to develop strains of hens which are less prone to feather pecking. However, the incidence of feather pecking is also affected by environmental conditions and management practices.

8.3 Induced Moulting

Introduction

Induced moulting must not be used as a routine procedure and should only be carried out as a last resort when alternative strategies cannot be applied.

Adequate feeding space should be provided during such practices.

Minimum Standard No. 16 – Induced Moulting

- (a) Induced moulting must be used only when replacement hens are not available, not as a routine management practice.
- (b) Induced moulting must be undertaken under veterinary supervision.
- (c) Induced moulting must only be carried out on healthy layer hens less than 74 weeks of age and under conditions that will avoid heat or cold stress.
- (d) Induced moulting must use a non-fasting method of moult inducement.
- (e) Hens being moulted must be fed a replacement diet approved in consultation with a nutritionist and veterinarian in order to provide adequate nutrition while ensuring moulting takes place.
- (f) Water must always be available.

Example indicators for Minimum Standard No. 16 – Induced Moulting

- Records are available of consultation with nutritionists or veterinarian where induced moulting has been undertaken
- Levels of mortalities/culls during the moult are less than 3%

Recommended Best Practice

- (a) Induced moulting should not be undertaken.

9. Emergency Humane Destruction

Introduction

Humane destruction of hens, including chicks, may be carried out on individuals, such as culls and runts, or when depopulation is required for disease outbreak or at end-of-lay. The approved methods of destruction available are defined in the minimum standard.

Minimum Standard No. 17 – Emergency Humane Destruction

- (a) Persons undertaking humane destruction must be appropriately trained and must ensure that the hens are managed gently and calmly at all stages of the process.
- (b) When layer hens, including culls, need to be euthanased, the method chosen must ensure rapid death, confirmed by inspection.
- (c) Any equipment used to undertake humane destruction must be well maintained in order to operate efficiently and not used in ways that risk overloading.
- (d) Humane destruction must only be carried out by concussion followed by neck dislocation, electrical stunning followed by neck dislocation, neck dislocation alone, gassing with 70% CO² in air or 70% CO² and 30% nitrogen or inert gas (such as argon); and for day old chicks, instantaneous fragmentation or gassing.
- (e) The procedures for humane destruction by gassing (gassing with 70% CO² in air or 70% CO² and 30% nitrogen or inert gas, such as argon) must ensure the collapse of every hen within 35 seconds of exposure to the gas, the exposure of hens to the gas for at least a further four minutes following collapse, and final inspection to ensure that all hens are dead.

Example indicators for Minimum Standard No. 17 – Emergency Humane Destruction

- Protocols are documented
- Persons undertaking humane destruction are appropriately trained
- Evidence that hens are managed gently and calmly at all stages of the process.
- Evidence of equipment maintenance.

10. Hatchery Management and Chick Transport

Introduction

The aim of hatchery management is to produce healthy chickens. The key processes in hatchery management which affect the health and welfare of newly hatched chicks include:

- cleaning and hygiene procedures,
- prompt removal of chicks after hatching,
- grading of day-old chicks,
- humane destruction of cull chicks and unhatched eggs,
- satisfactory holding room conditions,
- satisfactory transport conditions for day old chickens,
- vaccinations carried out humanely and with minimum stress to the chicks,
- Infrared beak treatment (IRBT) equipment and automated vaccinators cleaned and serviced after every hatch where used,
- hatching trays with live chicks are moved smoothly and are kept level and precautions are taken to prevent chicks falling onto the floor.

Minimum Standard No. 18 – Hatchery Management and Chick Transport

- (a) The interval of time from hatching to first feed and drink must be as short as practicable and no more than 48h.**
- (b) Chicks must be handled and moved in ways that avoid falls and injury.**
- (c) Transport boxes/crates for day old chicks must have a minimum height of 10cm and a minimum floor space of 25 cm² per chick.**
- (d) Day old chicks must be held and transported in conditions of controlled temperature and airflow.**
- (e) Unhatched eggs must be destroyed humanely by instantaneous fragmentation.**
- (f) Unwanted chicks must be destroyed humanely by either instantaneous fragmentation or gassing.**
- (g) Fragmentation equipment is designed, operated and maintained to ensure fragmentation is instantaneous.**

Example indicators for Minimum Standard No. 18 – Hatchery Management and Chick Transport

- Staff training and supervision is documented and monitored.
- Appropriate behaviour and handling of chicks is observed.
- Appropriate action is taken when mishandling occurs.
- Cleaning, sanitising, hygiene and euthanasia programmes are documented.
- Temperature and ventilation during transport are appropriate for chicks.
- Where chicks are moved on conveyor belts, the maximum height between consecutive

conveyor belts does not exceed 40 cm.

- Chicks are delivered to the place where they will be reared as soon as possible after hatching
- Any chicks that fall on the floor are picked up immediately.

General Information

Air carriers need to conform to the current IATA regulations when accepting and transporting chickens.

11. Welfare Assurance

Introduction

The maintenance of good records is an integral part of a welfare assurance system and good farm management.

Recommended Best Practice

- (a) To help ensure that standards of animal welfare and husbandry are maintained, each commercial layer hen facility should implement a quality assurance system that provides for written procedures regarding hen welfare.
- (b) The elements of the quality assurance system should provide for the minimum standards, the indicators relevant to each and recommendations for best practice of this code.
- (c) The quality assurance system should require continual review of existing systems and procedures that could enhance the welfare of layer hens. Producers and the Egg Producers Federation of New Zealand should encourage ongoing debate and assessments of management practices that may improve the welfare of layer hens. Where improvements to current practice are identified, these should be communicated to producers via appropriate technology transfer methods such as seminars, workshops, and industry newsletters.
- (d) The quality assurance system should provide for all incidents resulting in significant sickness, injury or death of hens to be fully investigated and documented. Where the results of an investigation may have implications for current industry management practices, a report outlining the incident and implications should, as soon as it is available, be forwarded to the appropriate industry body for consideration.

General Information

The adoption or adaptation of an industry generic welfare assurance programme for welfare and husbandry procedures will meet these recommendations.

Appendix I: Interpretation and Definitions

Act	The Animal Welfare Act 1999.
animal	As defined in the Act: “(a) Means any live member of the animal kingdom that is – (i) A mammal; or (ii) A bird; or (iii) A reptile; or (iv) An amphibian; or (v) A fish (bony or cartilaginous); or (vi) Any octopus, squid, crab, lobster, or crayfish (including freshwater crayfish); or (vii) Any other member of the animal kingdom which is declared from time to time by the Governor-General, by Order in Council, to be an animal for the purposes of the Act; and (b) Includes any mammalian foetus, or any avian or reptilian pre-hatched young, that is in the last half of its period of gestation or development; and (c) Includes any marsupial pouch young; but (d) Does not include – (i) A human being; or (ii) Except as provided in paragraph above, any animal in the pre-natal, pre-hatched, larval, or other such developmental stage.”
available technology	NAWAC takes to mean technologies which are used practically to care for and manage animals, for example, existing chemicals, drugs, instruments, devices and facilities.
aviary / perchery	A type of barn system containing loose-housed hens (hens not in cages) in a barn with access to perches at a number of heights or multiple tiers which consist of a raised slatted area providing perching and access to food / water at each level.
barn	A building that houses layer hens as a single group, without access to an outdoor area but with an area for scratching. Includes aviaries and percheries.
beak treatment / tipping	The removal of the upper and lower tips of the beak .
brooding	The management of chickens from day-old to four weeks of age.
caking	Undesirable compaction of the surface of litter.

cage	A cage is an enclosure constructed of metal and holding 3-7 hens. Cages do not have perches and/or nest areas. They are inside a building and can be multi-tiered. Also called current or conventional cages.
chicks	Newly hatched layer chickens.
colony	A colony system is a modified and enlarged cage with more space than conventional cages and with perching, nesting and dusting bathing areas. It may also have an abrasive strip for claw shortening. A colony may also be referred to as a furnished or enriched cage, or furnished or enriched colony.
controlled environment	An enclosed insulated building containing pullets or layer hens which provides control of lighting, ventilation and temperature, with feed, water and egg collection also usually automated.
day-old chicks	Chicks up to 72 hours of age (surviving on their internal yolk sack).
embryonated egg	A fertilised egg which contains a developing chick embryo.
end of lay	When laying is terminated either naturally or as a management practice. It may be followed by moulting and a further laying period.
euthanasia	Humane killing.
free-range	A system of housing hens that provides access to an outdoor area. The housing can be either fixed or moveable, is similar to a barn, aviary or perchery without cages.
good practice	NAWAC takes to mean a standard of care that has a general level of acceptance among knowledgeable practitioners and experts in the field; is based on good sense and sound judgement; is practical and thorough; has robust experience-based or scientific foundations; and prevents unreasonable or unnecessary harm to, or promotes the interests of, the animals to which it is applied. Good practice also takes account of the evolution of attitudes about animals and their care.
hatchery	A facility in which fertile eggs are incubated and hatched in controlled environment cabinets.
hen(s)	A chick, chicken (including roosters), pullet or layer hen.
induced (forced) moulting	The deliberate practice of making hens in a group cease egg production simultaneously and then lose and replace feathers and restore bone integrity. It usually involves restriction of nutrients and reduced day-length and is conducted to bring hens into another laying cycle.
instantaneous fragmentation	Mechanical method of humane destruction of eggs and day-old chicks (also known as maceration).
lux	An international measure of light intensity (not to be confused with watts).
moulting	A natural shedding of the feathers of layer hens between laying cycles.

owner	As defined in the Act: “in relation to an animal, includes the parent or guardian of a person under the age of 16 years who – Owns the animal; and Is a member of the parent’s or guardian’s household living with and dependent on the parent or guardian.”
perch	An elevated structure allowing hens to roost off the ground.
perchery	See aviary.
person in charge	As defined in the Act: “in relation to an animal, includes a person who has an animal in that person’s possession or custody, or under that person’s care, control, or supervision.”
pest	As defined in the Act: “means – (a) Any animal in a wild state that, subject to subsection (2), the Minister of Conservation declares, by notice in the Gazette, to be a pest for the purposes of this Act: (b) Any member of the family Mustelidae (except where held under a licence under regulations made under the Wildlife Act 1953): (c) Any feral cat: (d) Any feral dog: (e) Any feral rodent: (f) Any feral rabbit: (g) Any feral hare: (h) Any grass carp: (i) Any Koi or European carp: (j) Any silver carp: (k) Any mosquito fish: (l) Any animal in a wild state that is a pest or unwanted organism within the meaning of the Biosecurity Act 1993.”
placement	Placing of day-old chicks in the rearing facilities or pullets in the laying facility.
point of lay	The commencement of laying by a sexually mature hen.
predator	An animal that preys on another.
pullet	Young layer hen from 72 hours of age to point of lay.
range	An outdoor area, usually grass, used by hens in free-range systems.

range management plan	<p>A plan that reviews and address issues that can affect the quality of the range including :</p> <ul style="list-style-type: none">• range rotation and spelling;• vegetation /pasture species on the range;• dealing with weather conditions;• siting of the range;• shade and shelter, and• drainage.
rearing	<p>Management of the chickens from day-old to point of lay (approximately 18 weeks of age).</p>
recommended best practice	<p>NAWAC takes to mean the best practice agreed at a particular time, following consideration of scientific information, accumulated experience and public submissions on this code. It is usually a higher standard of practice than the minimum standard, except where the minimum standard is best practice. It is a practice that can be varied as new information comes to light. Recommendations for best practice will be particularly appropriate where it is desirable to promote or encourage better care for animals than is provided as a minimum standard.</p> <p>Recommended best practices are identified in the text by a heading, and generally use the word “should”.</p>
scientific knowledge	<p>NAWAC takes to mean knowledge within animal-based scientific disciplines, especially those that deal with nutritional, environmental, health, behavioural and cognitive/neural functions, which are relevant to understanding the physical, health and behavioural needs of animals. Such knowledge is not haphazard or anecdotal; it is generated by rigorous and systematic application of the scientific method, and the results are objectively and critically reviewed before acceptance.</p>

Appendix II: Legislative Requirements

The Animal Welfare Act 1999 (the Act) imposes obligations on every person who owns or is in charge of an animal. This code has been issued pursuant to section 75 of the Act and will provide guidance on how to comply with the legislative requirements. However, this code does not provide an exhaustive list of the Act's requirements, and owners and those in charge of animals should note that they must comply with the minimum standards in this code *and* the general provisions in the Act. A copy of the Act is accessible at: <http://www.legislation.govt.nz>.

Contents of Codes

Section 69 of the Act provides that a code of welfare may relate to one or more of the following:

- a species of animal
- animals used for purposes specified in the code
- animal establishments of a kind specified in the code
- types of entertainment specified in the code (being types of entertainment in which animals are used)
- the transport of animals
- the procedures and equipment used in the management, care or killing of animals or in the carrying out of surgical procedures on animals.

In deciding to issue a code of welfare, the Minister must be satisfied as to the following matters set out in section 73(1) of the Act:

- that the proposed standards are the minimum necessary to ensure that the purposes of the Act will be met
- that the recommendations for best practice (if any) are appropriate.

Despite the provisions of section 73(1), section 73(3) of the Act allows NAWAC, in exceptional circumstances, to recommend minimum standards and recommendations for best practice that do not fully meet the obligations of:

- sections 10 and 11 – obligations in relation to physical, health and behavioural needs of animals
- section 12(c) – killing an animal
- section 21(1)(b) – restriction on performance of surgical procedures
- section 22(2) – providing comfortable and secure accommodation for the transport of animals
- section 23(1) and (2) – transport of animals
- section 29(a) – ill-treating an animal.

In making a recommendation under section 73(3), section 73(4) requires NAWAC to have regard to:

- the feasibility and practicality of effecting a transition from current practices to new practices and any adverse effects that may result from such a transition
- the requirements of religious practices or cultural practices or both
- the economic effects of any transition from current practices to new practices.

This code provides for the physical, health and behavioural needs (as defined in section 4 of the Act) of animals being presented for slaughter. These needs include:

- proper and sufficient food and water
- adequate shelter
- opportunity to display normal patterns of behaviour

- physical handling in a manner which minimises the likelihood of unreasonable or unnecessary pain or distress
- protection from, and rapid diagnosis of, any significant injury or disease,

being a need which, in each case, is appropriate to the species, environment and circumstances of the animal.

This code also takes account of:

- good practice
- scientific knowledge
- available technology.

Legal Obligations of Owners and Persons in Charge of Animals

The owner or person in charge of an animal has overall responsibility for the welfare of the animal in his or her care. The legal obligations set out below are not an exhaustive list of the obligations in the Act.

- (a) The owner or person in charge of an animal must:
- (i) ensure that the physical, health and behavioural needs of the animal are met in a manner that is in accordance with both good practice and scientific knowledge
 - (ii) where practicable, ensure that an animal that is ill or injured receives treatment that will alleviate any unreasonable or unnecessary pain or distress being suffered by the animal or that it is killed humanely.
- (b) The owner or person in charge of an animal must not without reasonable excuse:
- (i) keep an animal alive when it is in such a condition that it is suffering unreasonable or unnecessary pain or distress
 - (ii) sell, attempt to sell or offer for sale, otherwise than for the express purpose of being killed, an animal, when it is suffering unreasonable or unnecessary pain or distress
 - (iii) desert an animal in circumstances in which no provision is made to meet its physical, health and behavioural needs.
- (c) No person may:
- (i) ill-treat an animal
 - (ii) release an animal that has been kept in captivity, in circumstances in which the animal is likely to suffer unreasonable or unnecessary pain or distress
 - (iii) perform any significant surgical procedure on an animal unless that person is a veterinarian, or a veterinary student under the direct supervision of a veterinarian, or a person approved by a veterinarian
 - (iv) perform on an animal a surgical procedure that is not a significant surgical procedure (as defined by the Act) in such a manner that the animal suffers unreasonable or unnecessary pain or distress
 - (v) kill an animal in such a manner that the animal suffers unreasonable or unnecessary pain or distress.

Regulations Review Committee of Parliament

Codes of welfare are deemed to be regulations for the purposes of the Regulations (Disallowance) Act 1989. As such, they are subject to the scrutiny of the Regulations Review Committee of Parliament.

Any person or organisation aggrieved at the operation of a code of welfare has the right to make a complaint to the Regulations Review Committee, Parliament Buildings, Wellington.

This is a parliamentary select committee charged with examining regulations against a set of criteria and drawing to the attention of the House of Representatives any regulation that does not meet the criteria.

Grounds for reporting to the House include:

- the regulation trespasses unduly on personal rights and freedoms;
- the regulation is not made in accordance with the general objects and intentions of the statute under which it is made; or
- the regulation was not made in compliance with the particular notice and consultation procedures prescribed by statute.

Any person or organisation wishing to make a complaint should refer to the publication *Making a Complaint to the Regulations Review Committee*, which can be obtained from the website:

<http://www.clerk.parliament.govt.nz>, or by writing to: Clerk of the Committee, Regulations Review Committee, Parliament Buildings, Wellington.

Strict Liability

In the prosecution of certain offences under the Animal Welfare Act 1999 committed after 19 December 2002, evidence that a relevant code of welfare was in existence at the time of the alleged offence and that a relevant minimum standard established by that code was not complied with is rebuttable evidence that the person charged with the offence failed to comply with, or contravened, the provision of the Animal Welfare Act to which the offence relates. (See sections 13(1A), 24(1) and 30(1A) of the Animal Welfare Act 1999, as amended by the Animal Welfare Amendment Act 2002.)

Defences

It is a defence in the prosecution of certain offences under the Animal Welfare Act 1999 if the defendant proves that there was in existence at the time of the alleged offence a relevant code of welfare and that the minimum standards established by the code of welfare were in all respects equalled or exceeded. (See sections 13(2)(c), 24(2)(b) and 30(2)(c).)

If a defendant in a prosecution intends to rely on the defence under section 13(2)(c) or 30(2)(c), the defendant must, within seven days after the service of the summons, or within such further time as the Court may allow, deliver to the prosecutor a written notice. The notice must state that the defendant intends to rely on section 13(2) or 30(2) as the case may be, and must specify the relevant code of welfare that was in existence at the time of the alleged offence, and the facts that show that the minimum standards established by that code of welfare were in all respects equalled or exceeded. This notice may be dispensed with if the Court gives leave. (See sections 13(3) and 30(3).)

The strict liability provisions and the defence of equalling or exceeding the minimum standards established by a code of welfare apply to the following offences:

- Failing to Provide

Section 12(a): A person commits an offence who, being the owner of, or a person in charge of, an animal, fails to comply, in relation to the animal, with section 10 (which provides that the owner of an animal, and every person in charge of an animal, must ensure that the physical, health and behavioural needs of the animal are met in a manner that is in accordance with both good practice and scientific knowledge).

- **Suffering Animals**

Section 12(b): A person commits an offence who, being the owner of, or a person in charge of, an animal, fails, in the case of an animal that is ill or injured, to comply, in relation to the animal, with section 11 (which provides that the owner of an animal that is ill or injured, and every person in charge of such an animal, must, where practicable, ensure that the animal receives treatment that alleviates any unreasonable or unnecessary pain or distress being suffered by the animal).

Section 12(c): A person commits an offence who, being the owner of, or a person in charge of, an animal, kills the animal in such a manner that the animal suffers unreasonable or unnecessary pain or distress.

- **Surgical Procedures**

Section 21(1)(b): A person commits an offence who, without reasonable excuse, acts in contravention of or fails to comply with section 15(4) (which provides that no person may, in performing on an animal a surgical procedure that is not a significant surgical procedure, perform that surgical procedure in such a manner that the animal suffers unreasonable or unnecessary pain or distress).

- **Transport**

Section 22(2): A person commits an offence who fails, without reasonable excuse, to comply with any provision of section 22(1) (which provides that every person in charge of a vehicle or an aircraft, and the master of or, if there is no master, the person in charge of, a ship, being a vehicle, aircraft or ship in or on which an animal is being transported, must ensure that the welfare of the animal is properly attended to, and that, in particular, the animal is provided with reasonably comfortable and secure accommodation and is supplied with proper and sufficient food and water).

Section 23(1): A person commits an offence who, without reasonable excuse, confines or transports an animal in a manner or position that causes the animal unreasonable or unnecessary pain or distress.

Section 23(2): A person commits an offence who, being the owner of, or the person in charge of, an animal, permits that animal, without reasonable excuse, to be driven or led on a road, or to be ridden, or to be transported in or on a vehicle, an aircraft, or a ship while the condition or health of the animal is such as to render it unfit to be so driven, led, ridden or transported.

- **Ill-treatment**

Section 29(a): A person commits an offence who ill-treats an animal.

Inspection of Premises

Section 127(1): Inspectors appointed under the Animal Welfare Act 1999 have the power to enter any land or premises (with the exceptions of dwellings and marae), or any vehicle, aircraft or vessel, at any reasonable time, for the purpose of inspecting any animal.

Inspectors include officers of MAF, inspectors from approved organisations (e.g. Royal New Zealand SPCA) appointed by the Minister, and the Police.

Liability of employers, principals, directors and officers of bodies corporate

Sections 164 and 165 of the Animal Welfare Act lay out further provisions relating to offences committed by employers and charges against bodies corporate.

Appendix III: Codes of Welfare

Codes of Welfare

- Animal Welfare (Broiler Chickens: Fully Housed) Code of Welfare 2003
- Animal Welfare (Rodeos) Code of Welfare 2003
- Animal Welfare (Layer Hens) Code of Welfare 2005
- Animal Welfare (Zoos) Code of Welfare 2005
- Animal Welfare (Circuses) Code of Welfare 2005
- Animal Welfare (Painful Husbandry Procedures) Code of Welfare 2005
- Animal Welfare (Companion Cats) Code of Welfare 2007
- Animal Welfare (Deer) Code of Welfare 2007
- Animal Welfare (Dairy Cattle) Code of Welfare 2010
- Animal Welfare (Commercial Slaughter) Code of Welfare 2010
- Animal Welfare (Dogs) Code of Welfare 2010
- Animal Welfare (Sheep and Beef Cattle) Code of Welfare 2010
- Animal Welfare (Pigs) Code of Welfare 2010

Codes of Recommendations and Minimum Standards

- Sea Transport of Sheep from New Zealand, September 1991
- Welfare of Deer During the Removal of Antlers, July 1992, amended August 1994, August 1997
- Welfare of Horses, February 1993
- Care of Animals in Boarding Establishments, August 1993
- Sale of Companion Animals, September 1994
- Welfare of Animals Transported within New Zealand, November 1994, amended June 1996, August 1998
- Welfare of Animals at Saleyards, May 1995
- Emergency Slaughter of Farm Livestock, December 1996
- Welfare of Ostrich and Emu, September 1999

Guidelines

- Welfare of Stock from which Blood is Harvested for Commercial and Research Purposes, April 1996
- Welfare of Yearling Fallow Deer During the Use of Rubber Rings to Prevent Antler/Pedicle Growth, September 1997
- Welfare of Red and Wapiti Yearling Stags During the Use of Rubber Rings to Induce Analgesia for the Removal of Spiker Velvet, September 1998

<p>Codes and Guidelines may be obtained from:</p> <p><i>Executive Co-ordinator</i> <i>Animal Welfare</i> <i>MAF Biosecurity New Zealand</i> <i>Ministry of Agriculture and Forestry</i> <i>PO Box 2526</i> <i>WELLINGTON 6140</i> <i>Tel: 04 894 0366</i> <i>email: animalwelfare@maf.govt.nz</i></p>	<p>Or can be inspected at:</p> <p><i>Animal Welfare</i> <i>Ministry of Agriculture and Forestry</i> <i>Pastoral House</i> <i>Reception</i> <i>Level 10</i> <i>25 The Terrace</i> <i>WELLINGTON 6011</i></p>
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Codes and Guidelines are available on MAF's website.

The web page address is: <http://www.biosecurity.govt.nz/animal-welfare>.