

National Biosecurity Manual

Contract Meat Chicken Farming

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OBJECTIVES

- a) To prevent the introduction of infectious diseases to livestock.
- b) To prevent the spread of disease from an infected area to an uninfected area.

Biosecurity/quarantine is an integral part of any successful poultry production system. It refers to those measures taken to prevent or control the introduction and spread of infectious agents to a flock. Such diseases, whether clinical or subclinical, significantly reduce the productivity, profitability and long term financial viability of a poultry operation.

Vaccination can play an important role in any biosecurity program.

Biosecurity is about managing risk to meet the objectives stated above. It is essential that a risk assessment be conducted for each farming enterprise to establish what level of risk exists in each phase of its operations and introduce measures appropriate to these levels.

This manual identifies areas of risk and appropriate measures to minimise these risks. It is important, however, when undertaking the risk assessment that all factors that may impact on the biosecurity of the farm be taken into account. For example location, layout of farm, disease status of the district, proximity to other farms with avian species and interface with the processor. The latter includes pick-ups, serviceman, day-old chicks and feed deliveries.

As in any management program an audit process will be used to measure performance in meeting the established criterion. Part audits may be conducted by company service personnel on-farm, while full audits covering all aspects including the processor controlled interface will need to be done more formally. An audit team consisting of company personnel and grower representatives will conduct audits at least annually. Depending on third party requirements the audit process may need to be expanded to include other interests.

A biosecurity checklist for continuous improvement is attached as Appendix 8. Audits will be based on this checklist.

Biosecurity is like any other insurance policy and as such it is a prudent investment.

MAJOR ROUTES FOR DISEASE TRANSMISSION

Livestock

- Transfer of birds from farm to farm
- Dead bird disposal

Animals

- Wild birds/ducks
- Feral and domestic animals and pets
- Insects
- Rodents – rats/mice
- Domestic birds

People

- Contractors, maintenance personnel, neighbours, servicemen, friends
- Disease can be transmitted by, for example, hands, boots, clothing, dirty hair

Equipment

Vehicles

Air

- Transmission as an aerosol or dust

Water Supply

- Surface water attracts waterfowl, birds ingest contaminated water

LEVELS OF BIOSECURITY

Level 1 – Routine Biosecurity Procedures

These procedures should be implemented and followed on a daily basis. They give a high degree of assurance that diseases will not be carried into poultry houses on farms and will reduce the risk of transmission between farms. These should be seen as a minimum requirement.

Level 2 – High Risk Biosecurity Procedures

In the event of an outbreak of an emergency disease or serious endemic disease, High Risk Biosecurity Procedures will be implemented.

The procedures to be followed in an outbreak of virulent Newcastle disease (vND) of either Australian or overseas origin are detailed in a set of Standard Operating Procedures (SOPs) that were developed as a result of the vND outbreak in NSW in 1998/99. Refer to page 8.

SOPs are being developed for virulent avian influenza, very virulent infectious bursal disease (vvIBD) and turkey rhinotracheitis (TRT). The basic principles in each case are similar and relate directly to AUSVETPLANS.

Serious endemic disease include infectious laryngotracheitis (ILT), variant infectious bronchitis (IB), virulent Marek's disease (vMD) and avian encephalomyelitis (AE).

LEVEL 1 – ROUTINE BIOSECURITY PROCEDURES

1. Facility Standards

- 1.1 The farm site is defined as the immediate shed area, including pick-up areas and must have a perimeter fence.
- 1.2 Farm site gate must be lockable with appropriate signage indicating “Biosecure Area No Entry Unless Authorised” or similar wording, in addition, signage should also indicate the visitor is to contact grower before proceeding ie. telephone number and/or enquire at house.
- 1.3 Parking area for vehicles not entering farm site. Change area away from sheds with clean protective clothing and boots.
- 1.4 Footbaths containing an iodophor at 200ppm (or other suitable product) at all shed doorways must be used and separate footwear or plastic overshoes may be required for each poultry shed.
 - 1.4.1 Footbaths must be inspected daily and replaced as required – colour change is used as an indicator.
- 1.5 Adequate dead bird disposal method will depend on environmental compliance requirements (incineration with after burner, composting as per Appendix 1, collection as per Appendix 2).
- 1.6 All poultry housing should be designed and maintained so as to prevent the entry of wild birds and limit the access of rodents as far as is practical.
- 1.7 Landscape – trees and shrubs should not be in the immediate shed area (they attract birds) but set back, to disperse air. Vegetation buffers for environmental compliance should not be compromised. The area around the sheds should be mown and free from debris.
- 1.8 Rodent bait stations at 15 metre intervals around the outside of sheds.
- 1.9 Treated mains water supply is preferable and if this is not available, river or dam water may be used but must be chlorinated (see Appendix 3) or treated by some other appropriate method e.g. ultraviolet light. Alternative systems must be checked regularly to ensure efficient operation. Bore water, provided the system is enclosed, only requires chlorination if the microbiological counts are unsatisfactory.
- 1.10 Sheep and other domestic stock should not have access to the farm site. Pets should not be allowed in sheds.
- 1.11 No other avian species (poultry, ducks, geese, emus, ostriches, aviary birds, pet birds) to be kept on property.

2. Personnel Standards

- 2.1 Employees should not have contact with any other poultry, cage birds, emus, racing pigeons or pigs. An acceptable alternative would be to shower and change clothes before entering the farm site (see Appendix 4 “Personnel Quarantine Declaration”).
- 2.2 Repair and maintenance contractors who have had contact with poultry or other birds that day should not enter sheds in production unless a) it is an emergency and b) they use hand sanitiser, clean footwear and overalls. Routine maintenance should be conducted, where possible, between batches. Tools taken onto the farm must be cleaned and free of dust and organic matter.
- 2.3 Delivery drivers e.g. gas and feed, must not enter sheds.
- 2.4 Growers should avoid contacts as detailed in 2.1. Where contact is unavoidable, a shower and change of clothes is required before entering sheds.
- 2.5 Visitor’s book – a record must be kept of all visitors to the poultry sheds.
- 2.6 Any neighbours, friends, other growers, egg farmers or sales representatives likely to have been exposed to poultry or birds should at all times be restricted from the sheds unless they shower and change clothes. If you do have visitors who have contact with poultry they must only visit you at home in ‘street’ clothes (and vice versa).

3. Operational Standards

- 3.1 Rodent Baiting – bait stations to be checked weekly and fresh bait to be laid monthly or more often if required. An activity log must be maintained (see Appendix 5).
- 3.2 Visitors
 - 3.2.1 All visitors should park their vehicles outside the farm site unless it is essential that the vehicle be taken on site e.g. feed trucks. Visitors entering sheds to sign “Visitors Declaration” (see Appendix 6).
 - 3.2.2 Company service personnel by necessity make multiple farm visits on a single day. Visits should always be made from ‘clean’ areas i.e. home, younger or healthy farm. Protective clothing including headwear and boots should be worn on farm site. Hands must be sanitised before entering sheds. In an emergency visits may be made from a ‘dirty’ area after a shower and complete change of clothing.
 - 3.2.3 Pick up – there should be heightened awareness of disease control measures during the pick-up period. Pick-up crews should work from youngest to oldest or all young birds or all old birds on a nightly basis in accordance with the processing company’s pick up biosecurity procedures. Pick up is a processing company area of responsibility.
 - 3.2.4 Trucks carrying new or old litter should be cleaned daily.

- 3.3 Water Supply - if treated mains water is not available water must be chlorinated or treated by some other appropriate method e.g. ultraviolet light. Dam and bore water should be chlorinated at a level to achieve 1 – 2 ppm before water is used. There must be a holding time for chlorinated water of at least two hours before being used. Growers should be aware that not all mains water is treated. Chlorine testing must be carried out daily and results logged (see Appendix 3). Where other systems are used, efficiency must be checked at regular intervals. This may involve microbiological testing.
- 3.4 Farm Clothing - should not be worn off farm by the grower or his employees, nor should street clothing be worn on site. It is critical that boots are not worn or taken off-farm. They are the most likely method for personal disease spread.
- 3.5 Bird weighing to be carried out by growers using their own weighing frames and scales.
- 3.6 Feed spills must be cleaned up as they occur. Feed attracts birds and rodents to the farm.
- 3.7 Grass around the farm site must be kept cut – long grass attracts rodents and favours the survival of viruses and bacteria.
- 3.8 End of Batch Procedures - after final pick-up the shed doors must be kept closed until litter removal commences. After washing and disinfecting, shed doors must be kept closed. If drying is a problem ventilate using fans or bird wire screens in shed doorways. Wild birds must be kept out.
- 3.9 During full cleanouts, end of batch litter must not be stockpiled on farm site nor should the next batch's litter be placed in sheds before total disinfection.

LEVEL 2 – HIGH RISK BIOSECURITY PROCEDURES

These are in addition to Level 1 procedures and should be implemented in the event of outbreaks of emergency diseases and serious endemic diseases.

1. Facilities

- 1.1 Gates kept locked.
- 1.2 Shed doors locked.

2. Personnel

- 2.1 No visitors. Company personnel will discontinue routine visits except on suspicion of problems.
- 2.2 Repairs and maintenance – no routine work, only emergency work to be carried out.

3. Operational

- 3.1 Essential visits – head to toe shower before and after visit. A complete change of clothes and footwear is required and used clothing should remain on farm. Headwear to be worn.
- 3.2 Any vehicle, which must enter farm, must be washed and disinfected at wash pad before and after going onto farm (e.g. feed trucks, gas). Vehicles to be sanitised inside (with aerosol) and washable mats and vinyl must be washed.
- 3.3 Vehicles not entering farm but parking outside to be washed and disinfected before visiting another farm.
- 3.4 No birds or litter to be moved on or off farms until disease status is clarified. If a major outbreak should occur company will introduce further measures as required.

4. Standard Operating Procedures (SOPs) – Newcastle disease

The Newcastle Disease Management Plan provides the principles for managing a Newcastle disease outbreak and refers to a series of SOPs. These SOPs relate to both quarantined flocks and other flocks in a Designated Risk Area (DRA). The table of contents for the SOPs for non-quarantined flocks in a DRA is provided as Appendix 7. The items of specific relevance to broiler farms are Attachments 4, 5, 6, 9, 12 and 13.

Should these SOPs have to be implemented, companies will provide details to growers. They will be available at any time by contacting the Australian Chicken Meat Federation Inc.

APPENDIX 1 – DEAD BIRD COMPOSTING

1. Rodents, cats, dogs, feral animals, scavenging birds, flies must be kept away from composting carcasses.
2. Compostors should be away from sheds and boundary fences.
3. Composting area must be kept neat and clean at all times.

APPENDIX 2 – DEAD BIRD COLLECTION

1. Dead birds must either be collected daily or be stored in a freezer if collection is less frequent.
2. Freezer must have sufficient capacity to adequately handle carcasses between collections.
3. Collection area should be as far as practical away from the farm site so that the collection vehicle does not enter the site. For example a shed could be provided on a concrete base with doors on both sides, one for birds in, the other for birds out. Birds should not be left in the public view. Truck loading area should be washable.
4. A facility is required to wash and disinfect dead bird containers before returning them to farm.

APPENDIX 4 – PERSONNEL QUARANTINE DECLARATION (FARM EMPLOYEE)

I hereby agree to abide by **MY EMPLOYERS BIOSECURITY** rules and standards.

I understand the following quarantine rules/standards apply:

- 1. No avian species to be kept at my place of residence i.e. no poultry or birds of any type (e.g. ostriches, aviary birds or racing pigeons) without prior approval of my employer. If approved, employee must shower and change clothes before entering the farm site.
- 2. No pigs to be kept at my place of residence.
- 3. No untreated poultry manure from other farms to be used at my place of residence.
- 4. No member of my household is to work in any area where contact can be made with poultry or pigs. For example, on other farms or at hatcheries, processing plants, by-product plants, laboratories or with pick-up crews, unless the employee showers and changes clothes before commencing work.
- 5. I will not visit poultry abattoirs, pig farms or poultry shows unless approved by my employer and appropriate quarantine measures are taken.

Signature Date.....

Residential Address.....

.....

APPENDIX 6 – CONTRACT BROILER FARM ENTRY PERMIT

Authorisation for Entry to:

Authorisation For:.....

Date of Entry:

Entry to the farm is subject to the following conditions:

<input type="checkbox"/>	I do not have poultry, caged birds or pigs at home.
<input type="checkbox"/>	I have not been in contact with any avian species or untreated poultry manure within 12 hours.
<input type="checkbox"/>	Wear protective clothing provided.
<input type="checkbox"/>	Wear protective boots.
<input type="checkbox"/>	Sanitise boots in the footbath provided on entering farm/shed.
<input type="checkbox"/>	Sanitise hands before entering sheds

I agree to the terms and conditions of entry.

OBJECT OF VISIT

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Name..... Signature.....

Government representatives, inspectors and audit teams will need to make special arrangements with the owner if they cannot comply with the entry permit conditions.

APPENDIX 7 – SOP FOR FLOCKS IN DESIGNATED RISK AREAS (OTHER THAN QUARANTINED FLOCKS)

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Note: These SOPs are currently under revision to become generic rather than to meet a specific NSW situation. Major changes are not anticipated.

