Chicken Farmers of Canada
Les Producteurs de poulet du Canada

The New 2005 Edition of

Safe, Safer, Safest

Chicken Farmers of Canada's

On-Farm Food Safety Assurance Program

Instructions:

- Remove all of the pages from your current food safety binder – but don't throw out the tabs separating each chapter.
- Replace each chapter with the chapters that have been provided in this package.
- Read about the modifications on the summary sheet and how they affect the program – each modification in the manual has been identified with a star for easy reference.
- By the end of 2005, all of the new requirements of this edition are expected to be implemented on farms and will be evaluated during your next audit.
- If you require additional copies of the manual, or you need a new binder, please contact your provincial board office.

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Safe, Safer, Safest
- The New 2005 Edition -

2005

Dear Fellow Producers,

Enclosed you will find a new edition of ***Safe, Safer, Safest*** - CFC's On-Farm Food Safety Assurance Program.

This new edition incorporates amendments based on lessons that have been learned during implementation across the country, the avian influenza outbreak, clarifications of requirements for easier understanding and scientific evidence.

Please take the time to read over the list of amendments and to understand how these amendments affect how the program is implemented. As a guide, the location of each amendment in the manual has been marked with a star.

The new requirements of this edition are expected to be implemented on farms in the Fall of 2005, and will be evaluated during your next audit, starting in 2006.

The ***Safe, Safer, Safest*** manual first completed the Canadian Food Inspection Agency's technical review process in 2002. Successful completion of the technical review indicates that ***Safe, Safer, Safest*** is comprehensive from a food safety standpoint and has been approved under internationally recognized standards. This new edition follows the premise of continual improvement while maintaining the foundation of CFIA technical recognition.

Nearly two thirds of chicken farms in Canada have been audited while five provinces have regulations mandating farms to implement CFC's program. Canadian chicken farmers are placing themselves at the forefront of food safety and will be able to prove to national and international consumers that Canadian chicken is produced according to internationally recognized standards.

The success to date of the ***Safe, Safer, Safest*** program has been in large part due to the efforts of each and every chicken farmer across the country! Thank you for participating in this national effort.

Sincerely,

Jacob Middelkamp
Chair, CFC Food Safety Committee

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Safe, Safer, Safest - 2005 Edition

List of Amendments

This list of amendments represents the changes to the MD and HR requirements of the *Safe, Safer, Safest* program. As a guide, the location of each amendment in the manual has been marked with a star. This is only a listing of the amendments; review the manual for more detail.

Overall

- Annual sheets have been renamed SOP's (standard operating procedures) to differentiate from flock records.
- The sample audit checklist has been edited to include all of the amendments to the requirements and to help you prepare for your audit (p xii).

Chapter 1 Controlling Access to the Farm

New/Edited MD:

- The visitors log book must contain the date, name and previous poultry contact (p 1.3).
- A dedicated pair of boots, or similar, must be available in each barn (p 1.3) – with this, common contact between the CAZ and the RA (i.e. feet) can not exist (p 1.3).
- When entering the barn, all visitors and workers must follow your boot biosecurity protocol (p 1.3) and the farm manager or similar must accompany visitors accessing the barn or be sure they know the biosecurity protocol (p 1.4).
- Suppliers must only enter the barn if absolutely necessary (p 1.4).
- If farm workers come into contact with other poultry, adequate measures must be in place and these must be described in your SOP's (p 1.5).

New HR:

- Roadways entering the CAZ should be identified by a sign or barrier (p 1.2).
- A barrier should exist between the CAZ and RA to eliminate common contact (p 1.2).
- A diagram should be drawn depicting the CAZ, RA, etc. (p 1.3).
- Chicken farmers should not raise other poultry or keep birds as pets (p 1.5).

SOP 1 has been edited to include the new record keeping requirements (p 1.7).

Chapter 2 Access to Space, Feed and Water

New/Edited MD:

- For on-farm feed mixing operations, only the final product needs to be sampled (p 2.2).
- Feed transfers can occur between two farmers where feed bins are under common management protocols (p 2.3).
- The Feed Sampling protocols have been moved from Chapter 11 to the Feed section in Chapter 2. The sampling protocols have been modified to allow different methods based on medicated vs. non medicated feed and double bin vs. single bin systems (p 2.5).
- Both cleaning and/or disinfectant products are acceptable to be used to clean water lines (p 2.8 and 3.4).
- If a disinfectant is being used whose label recommends the use of a cleaner prior to the use of the disinfectant, than a cleaner must be used (p 2.8).
- The water treatment section has been moved from Chapter 11 to the Water section in Chapter 2 (p 2.9).

Chapter 2 Access to Space, Feed and Water (Continued)

- The annual bacteriological water test has been amended to only require enumeration of total coliforms and faecal coliforms to be in line with federal requirements (p 2.10).

SOP 2 has been edited to include the new record keeping requirements (p 2.12).

Chapter 3 Cleaning and Disinfecting

New/Edited MD:

- A better description of the cleaning process after each flock is included (p 3.2).
- The barn must be fumigated or disinfected at least once per year after the barn has been washed – instead of after each flock (p 3.3).
- The requirements for flow-through barns have been amended (p 3.4).

New HR: The barn and equipment should be washed with water and disinfected after each flock (p 3.3).

Chapter 4 Bedding

New/Edited MD: Upon placement of the litter in the barn, it is to be checked for mold, feathers and bird droppings and this activity is to be recorded (p 4.1).

Chapter 5 Chicks

New/Edited MD: For vaccines, hatcheries are only required to specify the type of vaccine, not the dosage level (p 5.1).

New HR: It is now only HR to receive the dosage level of vaccine from hatcheries (p 5.1).

Chapter 6 Other Input Materials

New/Edited MD:

- All chemical containers must be labelled with product name and concentration (p 6.1).
- Any chemicals used in the grow-out period that have a withdrawal period, must be recorded in the flock file instead of on the flock sheet (p 6.2).
- The Flock Sheet instructions have been moved from Chapter 11 to Chapter 6 (p 6.4).

Chapter 7 The Grow-Out Period

New/Edited MD: The statement for back-up systems has been clarified to include both power failures and temperature variations (p 7.2).

Chapter 8 Handling Birds During the Grow-Out Period

New/Edited MD: You must inform the CFIA and your provincial board if a reportable disease (Avian Influenza/Newcastle etc.) is suspected or confirmed on your farm (p 8.1).

Chapter 10 Viewing Your Production Cycle from a HACCP-based Perspective

- The Section on "Control Measures and Corrective Actions" for the critical control points in *Safe, Safer, Safest* have been moved from Chapter 11 to Chapter 10 (p 10.4).

Chapter 11 Record Keeping – Filling out the Forms

- This chapter has been re-written to provide a better overview of the types of records, what records need to be used when and what information is required on each record.

Forms

- All forms have been changed to reflect the amendments to the requirements.

INTRODUCTION

Chicken Farmers of Canada (CFC) is a leader in the area of food safety, and has developed a comprehensive on-farm food safety assurance program. The *Safe, Safer, Safest* manual recommends the most modern methods and techniques for on-farm food safety, emphasizing health, cleanliness and safety through every step of the production cycle.

Safe, Safer, Safest is the standard for food safety requirements for chicken production in Canada. In fact, this manual has been granted technical recognition by the Canadian Food Inspection Agency (CFIA) for promoting the production of safe food at the farm level and adhering to the Hazard Analysis Critical Control Point (HACCP) principles as defined by *Codex Alimentarius*. *Codex Alimentarius* is an international system for formulating and harmonizing food standards.

Food safety can no longer be the responsibility and concern of a single group: all partners in the chicken supply chain need to participate. At the farmer level, CFC has gone ahead and implemented this program because we feel that growing clean, wholesome birds is not an option, it's a must. It's our bread and butter!

Traditionally, chicken farmers made their decisions based on what they could see or smell. Now, CFC is moving its members towards a system based on scientific principles. Farmers will have to demonstrate that they have identified, considered, controlled and/or prevented the chemical and biological food safety hazards present in growing and transporting live birds. *All of these hazards are described in this manual*.

We are not the only ones implementing food safety programs. In fact, the entire poultry industry is adopting a proactive approach to food safety. Processors have a new program called the Modernized Poultry Inspection Program (MPIP). Under MPIP, federal inspectors will do their work using quality control systems based on Hazard Analysis Critical Control Point (HACCP) principles. Information from the farm will become an integral part of MPIP to ensure adequate control of the evisceration process.

CFC believes its members will benefit from being forthcoming and proactive by putting an effective system in place before it becomes mandatory. In this fashion, CFC will have control over the direction and content of the *Safe,Safer, Safest* manual. In addition, chicken farmers in Canada will be ensuring a strong market in this new era of traceability and food safety by proving that the safety of the supply is excellent. CFC is therefore implementing the program with the full and active support of its Board of Directors and encouraging all farmer members to adopt it.

CFC and its Food Safety committee are confident that by controlling the practices and potential hazards identified in this manual, consumers will be given extra assurance that farmers are continuing to help improve Canada's high quality food safety standards.

What is HACCP, anyway?

HACCP is short for Hazard Analysis Critical Control Points. It is an internationally recognized approach to food safety. The Pillsbury Company created the concept for NASA in the late 1950's. Their goal was to be able to guarantee safe food to the space program.

HACCP:

- is a systematic approach to make sure that food is safe
- targets preventing initial food safety hazards instead of detecting problems in the finished product
- gives more control during manufacturing to make sure that each and every product is safe, wholesome and of high quality
- uses sound, well-known principles of science and technology to choose and take corrective actions when a problem is found

The Seven HACCP Principles

The World Health Organization (WHO) has set out seven principles to follow when developing a HACCP plan. These are:

1. Identify the biological, chemical and physical hazards for each raw material and production step.
2. Apply the HACCP Decision Tree to find which of these hazards are Critical Control Points (CCPs). The Decision Tree is described later in more detail.
3. Set critical limits to ensure that each of the CCPs is under control.
4. Set up monitoring procedures for each CCP.
5. State what corrective actions will be followed whenever a problem is found.

6. Set out verification procedures to prove that the control program is working.

7. Set up records and documentation to prove that you are actually doing what you say you will do.

The *Safe, Safer, Safest* manual, its record keeping forms and the critical control points that have been identified were developed using HACCP principles.

Developing the *Safe, Safer, Safest* Manual

Food safety is a first priority. Consumers, government, food processors, farmers and farm suppliers all have a stake and a role to play. Canadian farmers are always working to meet the challenge of providing consumers with the best food possible. So too is Chicken Farmers of Canada (CFC).

In 1996, CFC set up its food safety assurance design team. The food safety committee was designed with representatives from the west, central and maritime regions. The team's task was to create a food safety assurance program for use on the farm. Since then CFC has:

- reviewed the Recommended Codes of Practice for Care and Handling of Poultry as well as flock health and biosecurity codes. CFC kept the main parts of this Code in the recommended Good Production Practices (GPP) of this manual.

- reviewed different production practices used across Canada

- studied the seven principles of HACCP in detail, and identified two Critical Control Points (CCPs) in chicken production

- created record keeping forms for the GPPs and the CCPs that were identified

- pilot tested the program on farms to make sure that the Safe, Safer, Safest manual is practical

- identified those farm practices for which there is not enough data or for which no control measures are available

- obtained recognition from the Canadian Food Inspection Agency for the technical soundness of the Safe, Safer, Safest manual

- conducted a detailed review in 2005 based on implementation lessons and scientific evidence – resulting in a new edition of the manual

Safe, Safer, Safest is the result of CFC's work. It describes how potential hazards found in chicken production can be controlled and who can control them. The record-keeping forms give the information needed to show that farmers are doing what they say they do. All farmers must ensure this level of control of their operations.

This manual is a living document. In the future, it will change. Research studies may prove that we can change the level of emphasis of a particular practice. On the other hand, we may find that a means by which we can control a hazard becomes known.

By following this manual and using its record-keeping forms, chicken farmers will be able to demonstrate that they are doing their part to ensure the safety of the food supply.

HOW TO USE THIS MANUAL

The *Safe, Safer, Safest* manual has been developed to first cover issues regarding the entire farm, and follows a chronological order from when the chicks are received to the time of shipping.

In each section, production practices have been designated with either an **MD** or an **HR**. These designations have resulted from the scientific HACCP approach Decision Tree.

MD represents a "MUST DO" production practice. These are mandatory to protect your flock against food safety hazards throughout the production cycle. **HR** represents a "HIGHLY RECOMMENDED" production practice which indicates its high importance in the on-farm food safety program. HR production practices are not mandatory, but they are strongly recommended to ensure biosecurity, health and food safety of flocks.

This manual is designed to be used as a reference tool throughout the production cycle. At any time, the index at the back of the manual can quickly be used to locate information.

To begin, read through the manual and understand the concepts and practices described in each section. Each section fully describes all of the requirements that need to be performed to be in compliance with the on-farm food safety program.

Next, go ahead and implement the requirements of the program – you'll find you're already implementing most of them. To prove the implementation, use the record forms to record each activity. See chapter 11: "Record Keeping – Filling out the Forms" for more information.

ON-FARM AUDIT AND CERTIFICATION PROCESS

The on-farm audit and certification procedures are being performed by each provincial board office. While the program will be applied consistently across the country, farmers should contact their respective offices for more information. The following represents an outline of the audit and certification process:

(1) Farmer Pre-Audit Checklist

Prior to undergoing an on-farm audit, each farmer should complete the pre-audit checklist to assess their preparedness for a real audit. Farmers should ensure they can answer each question before deciding that they are ready for an audit.

Once filled out, farmers should have a fairly good idea if they are complying with the *Safe, Safer, Safest* requirements. This pre-audit checklist can be found on page xii.

(2) On-Farm Audit and Certification Process

Once farmers feel they are ready for an on-farm audit, they should contact their respective provincial board office to schedule an audit.

Prior to undergoing an audit, each farmer will be required to accumulate three flocks of records.

During the initial full audit,

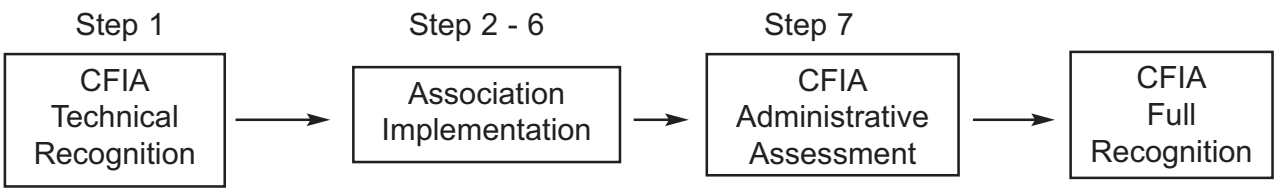
- A trained auditor will review the mandatory and highly recommended elements of the Safe, Safer, Safest program. Special attention will be paid to the records (standard operating procedures and flock records).
- The auditor will also conduct visits to barns and to related production facilities, to evaluate whether the GPPs and CCP's described in the manual are being implemented.
- A standard audit checklist has been developed and will be used by the auditor during the audit. This checklist encompasses all of the "Must Do" and "Highly Recommended" requirements in each chapter. Each requirement will be rated as either "Acceptable" (A), "Unacceptable" (U), Needs Improvement (NI) or as "Non-Applicable" (NA).
- Whenever a "Must Do" item is rated U or NI, the auditor will identify the deficiency through a "Corrective Action Request" (CAR). Should the auditor identify a CAR as a result of the audit, this will be recorded on the audit report. In this case, the farmer will have to document how this deficiency will be corrected and by when; a follow-up visit may be necessary to assess the implementation of the corrective actions.

- Prior to leaving the farm, the auditor will complete the audit report, which will be discussed with the farmer and a copy of the report will be left with the farmer.
- Once all CARs have been completed, the audit report will be sent to the certification agent so that the certification process can proceed. Prior to certification, each farmer must sign a declaration indicating that they will continue implementing the GPP's and CCP's of the program.
- The "Highly Recommended" items will be rated A-U-NI-NA, however they will not be taken into consideration in the overall certification of the audit. Over time, however, they will be a good indication of how a production facility is improving. Only the items listed under the "mandatory" section (i.e. the Must Do's) will be taken into consideration for certification purposes.
- Once successful, each farmer will be provided with a certificate. In the event that a previously-certified farm requires a corrective action request during a subsequent audit, the farmer will be allowed to take immediate corrective actions and/or to submit an action plan to the satisfaction of the program auditor (i.e. with specific actions and a precise deadline).
- The on-going certification of a farm will include a frequency of full audits, partial audits, off-farm record reviews and self-declarations.

Farmers will be required to retain at least one year's worth of records at all times. Further information regarding the audit frequency and certification procedures will be available from CFC and your provincial board offices.

CFIA RECOGNITION PROCESS OF ON-FARM FOOD SAFETY ASSURANCE PROGRAMS

The CFIA has been given the task of recognizing on-farm food safety assurance programs. All agricultural commodities in Canada (e.g. turkey, dairy, swine, beef, etc.) are developing on-farm food safety assurance programs. The following diagram is a representation of the stepwise approach to full CFIA recognition for CFC's program.



Step 1: CFIA to lead, with provincial representatives, a technical review
Step 2: Industry to develop management structure in an audit-based format
Step 3: Industry to format on-farm food safety program in an audit-based structure
Step 4: Industry implementation of full program
Step 5: Industry to source third-party audit services
Step 6: Third-party full systems audit
Step 7: CFIA to lead, with provincial representatives, a national assessment and recognition process

To date, CFC has completed step 1. Technical recognition was officially granted by CFIA on July 30, 2002. CFC is now in the process of implementing the program and its management structure. CFIA full recognition will be a very large benefit for the chicken industry in Canada as it will unquestionably demonstrate the safe production practices of Canadian chicken.

In a new era of traceability, liability and food safety, CFC believes its members will benefit from being proactive and by putting effective systems in place before our industry faces growing pressure from consumer groups or from industry to become mandatory. This initiative will require the support and work of every member of the Canadian chicken industry. However, this goal is achievable and can be a demonstration of the strength of our industry!

List of Definitions

Approved Medications: All HC approved drugs are issued a Drug Identification Number (DIN). Approved drugs are veterinary drugs which have been evaluated by the Veterinary Drugs Directorate (VVD) of Health Canada (HC) prior to approval of a label indicating the conditions of use including the: a. Species (e.g. chicken); b. Indications for use (e.g. to prevent coccidiosis); c. Route of administration (e.g. water, feed or injection); d. Maximum dosage and frequency or length of treatment; e. Precautions which may include a withdrawal time.

Complete Cleaning: A complete cleaning must occur at least once a year and includes the following: (1) the removal of manure from inside the barn and removal of all organic matter, through blowing or brushing, from all of the floors, walls, ceilings, fans and equipment; (2) a thorough washing of all floors, walls, ceilings and equipment with water under high pressure and (3) either a disinfection or a fumigation.

Controlled Access Zone (CAZ): An area designated by the farmers around the outside of the barn to limit what comes into contact with your flock. The zone is to include the feed and fuel tanks, but not the manure storage area. It is highly recommended that the zone be at least 15 metres around each barn.

Corrective Action Request: A formal request to the farmer for actions to be taken to correct non-conformities, in order to achieve or maintain certification, that have been identified through the audit process.

Critical Control Point: A step in the production cycle at which control can be applied and is essential to prevent or eliminate a food safety hazard to reduce it to an acceptable level.

Extra Label Drug Use (ELDU): The use of a drug product in a manner that is not consistent with what is indicated on the label, package insert or product monograph of any drug product approved by HC. For example, ELDU can include use with an alternate species (e.g. chickens versus cattle) or using an increased dosage.

Feed Transfer: This is a process that occurs between two farmers whenever feed is moved from a feed bin on one farm to a feed bin on another farm.

Full audit: An on-farm/on-site evaluation of records, statements of fact or other relevant information to determine the extent to which all the specified requirements (GPPs and CCPs) of the program are met. A full audit may be undertaken as either an initial assessment or as part of an audit program.

Hazard Analysis Critical Control Points (HACCP): A method of using sound, well-known principles of science and technology to identify initial food safety hazards during production instead of detecting problems in the finished product.

Off-Label Use: Use of an unapproved drug product (a drug product which does not have a DIN). Use of a drug which was never approved for use by a Canadian regulatory authority.

Partial audit: An on-farm/on-site evaluation of records, statements of fact or other relevant information to determine the extent to which a subset of the specified requirements (GPPs and CCPs) of the program are met. A partial audit is undertaken as part of an audit program.

Partial Cleaning: This is the minimum cleaning that must be performed after each flock. This includes at least the removal of manure from inside the barn and removal of all organic matter, through blowing or brushing, from all of the floors, walls, ceilings, fans and equipment. All rooms within the barn (electrical/office) must be cleaned as thoroughly as possible.

Records assessment: An off-farm evaluation of a subset of records or other relevant information to determine the extent to which all or a subset of the specified requirements (GPPs and CCPs) of the program are met. This evaluation might include direct communication with the farm representative.

Restricted Area (RA): This is the area inside the barn where the birds are housed. This zone is established to restrict access and thus reduce the chance that any potential carrier of infectious agents will come into contact with your flock. Biosecurity measures should be at their highest when entering the RA.

Self Declaration: An attestation by the farm operation that all the specified requirements (GPPs and CCPs) of the program are met. In filing the declaration with the conformity assessment body, the farm operation shall include the completed self-evaluation checklist and any other required documents or records.

Water analysis: All water sources used for chicken production must be tested annually by an accredited laboratory. This testing includes a bacteriological analysis (enumeration of total coliforms per 100 mL and faecal coliforms (E. coli)) and if you are using well water, the local health authorities must be contacted to check if there is a mandatory requirement for chemical testing in your area.

GOOD PRODUCTION PRACTICES FOR GROWING CHICKENS

Planning for Change

This *Safe, Safer, Safest* manual has been revised from the previous version. Every farmer will probably have to make a few changes to their operation to follow the manual. Plan for the change.

- First, read the manual carefully. Make sure you understand it thoroughly.
- Then make an action plan for the changes you will need on your farm. Make sure that you meet all of the basic requirements of the manual. These are the things you must do to comply. Then start planning to incorporate the extra things that you need to into your regular practices as soon as possible.
- Finally, schedule a regular review of your action plan. This will let you check your progress. Regular reviews give you the chance to revise your plan. This will also give you a good chance to reinforce the need for good animal husbandry practices with your employees.

Hiring and Training Staff

Good animal husbandry and good management practices go hand in hand with good results. Start with your staff. You will never get top results unless you have top employees.

Hire and promote people who know and care about good animal husbandry practices, cleanliness and disease prevention.

Train and retrain every employee. Make sure each one is an expert in good husbandry, disease prevention and worker safety.

MD Give them the information that they need to do the job right. All staff must read and understand the *Safe, Safer, Safest* manual.

HR Allow your staff to have a knowledge of the Recommended Codes of Practice for the Care and Handling of Poultry and to understand the concepts of HACCP and food safety.

Provide checklists or other aids that will help them do their jobs. Finally, keep track of their success and reward them for it.

Set a good example. If you want your staff to practice good husbandry, give them a model to follow. Show them what is right, and expect them to follow your lead.

Keep current. Research and technology are leading to improvements all the time. Procedures, equipment, pharmaceuticals, nutrition and breeding stock are always changing. If you are going to get the best possible results, you need to stay up on the trends and to share your knowledge with your employees.

Finally, make sure that everyone has suitable clothing, equipment and masks for all of the work they have to do in the barns.

SAMPLE AUDIT CHECKLIST

The following checklist covers all of the mandatory and highly recommended items in the *Safe, Safer, Safest* manual. This is not the exact checklist that an auditor will use, but it should be used as a guide to indicate if your farm is ready for an audit - and can point to items that need to be addressed.

Check off the items that are currently being performed and focus on those that remain. Ensure that a record keeping system is kept that can be used to demonstrate your implementation during the audit.

√	Manual Reference	Requirement
Mandatory Items		
❒	x	All staff have read the *Safe, Safer, Safest* manual
❒	1.1	Barns have a Controlled Access Zone (CAZ)
❒	1.1	Manure is stored outside of the CAZ
❒	1.2	Signs are posted to indicate the Restricted Area
❒	1.2	Barn entrances to the Restricted Area are kept locked
❒	1.3	Visitors log book is maintained for the Restricted Area
★ ❒	1.3	Visitors and workers follow your boot biosecurity protocol
★ ❒	1.3	Dedicated boots, or similar, are available for each barn
★ ❒	1.3	No common contact is allowed (i.e. feet) between the CAZ and the RA
★ ❒	1.4	Suppliers only enter the barn if necessary
★ ❒	1.4	Farm manager accompanies visitors accessing the barn
❒	1.4	Pests are prevented from entering the barn – the pest control program is documented
❒	1.4	Pets are not allowed in the Restricted Area
❒	1.4	Barn electrical room/office kept clean/free of debris
❒	1.4	Gaps in the eaves are patched
❒	1.5	Damaged screens are repaired
❒	1.5	Weeds and grass are cut regularly within the CAZ

	√	Manual Reference	Requirement
	❒	1.5	Area around the barn is kept free of debris
	❒	1.5	Potholes/depressions filled where water can stagnate
	❒	1.5	Feed spills below augers and bins removed
★	❒	1.5/1.7	SOP describes biosecurity procedures for staff that are in contact with other poultry
	❒	2.2	Control program used for on-farm feed mixing/ addition of feed ingredients
★	❒	2.2	The final mixed feed is sampled for all on-farm feed mixing
★	❒	2.3	Feed transfer protocol used for on-farm feed transfers
	❒	2.4	Feed and feed ingredients are stored in closed and clearly identified bins
	❒	2.4	Feed bins inspected for feed/rain leaks after each flock
	❒	2.4/3.1	Feed bin inspected for rust and feed caking at least once per year and cleaned if necessary
	❒	2.4/3.1	Feed bin boots and lines are emptied between flocks
★	❒	2.5	All delivered feed is inspected and bill of lading checked for any medications
★	❒	2.5/2.7	Feed samples collected for each flock - control measures used to prevent cross-contamination – and samples stored for 14 days after shipping
	❒	2.8	Water lines flushed at full pressure between flocks
★	❒	2.8/3.4	Water lines cleaned or disinfected during and/or in between flocks
★	❒	2.8	When using a water disinfectant, a cleaner is used as per manufacturers' recommendations
★	❒	2.10	Water analysis tests performed yearly
	❒	2.10	Water quality control checks are completed each flock as per CCP 1
★	❒	2.9	Water treatment is recorded on CCP-1 and verified weekly
	❒	2.9	Precision of the water treatment system verified yearly
	❒	2.11	Water medicator tested for accuracy before each use

	√	Manual Reference	Requirement
	❒	3.1	Barn cleaned and disinfected after a disease breakout that required a depopulation
	❒	3.1	Fans are cleaned, washed and disinfected regularly
	❒	3.1	Dust build-up removed from barn exteriors and equipment
	❒	3.2	Barn and all equipment are cleaned after each flock
★	❒	3.3	Barn is completely washed and disinfected at least once a year
	❒	3.2	Electrical/office rooms in barns are cleaned as thoroughly as possible
	❒	3.3	Manure is stored downwind from barns and not spread on land adjacent to the barns
	❒	3.4	Equipment used for barn clean-out is washed and disinfected
★	❒	3.4	Proper procedures are used for flow-through barns
★	❒	4.1	Litter is checked for mold, feathers and bird droppings upon placement in the barn
★	❒	5.1	Written assurance regarding vaccinations (type administered) must appear on the hatchery invoice
★	❒	5.1	Written assurance regarding medications with dosage level given at the hatchery must appear on the hatchery invoice
	❒	5.1	Written assurance from hatcheries for Cornish chicken
	❒	5.3	Adequate litter provided; temperature and drinking lines adjusted before chick delivery
	❒	5.4	Chicks are observed at arrival and 3-4 days into grow-out; observations are recorded
	❒	6.1/6.3	Provincial regulations for purchasing, using and storing medications/chemicals are adhered to
	❒	6.1	Supplies are verified at arrival with the label and order
★	❒	6.1	Medications/feed additives stored according to manufacturer recommendations and only with compatible products – all chemical containers are properly labelled
	❒	6.1	Staff are properly trained to administer medications or use chemical products

	√	Manual Reference	Requirement
	❒	6.1	Only use medications approved for use in chicken
	❒	6.1	Chemicals used must be approved for use in food animal premises
	❒	6.1	Only use products according to instructions from the manufacturer or your veterinarian
	❒	6.1/8.2	Medications used are noted on the flock sheet
★	❒	6.2	Chemicals used during the grow-out are recorded
	❒	6.3	Extra/off-label medications used only with a veterinary prescription
	❒	6.3	Non-prescription medications only used as per label instructions
	❒	6.4	A veterinary prescription for off/extra label medication is submitted with the flock sheet
★	❒	7.2	A functional monitoring system for power failures and temperature variations is in each barn
	❒	8.1	Chickens are checked at least twice a day during grow-out
	❒	8.1	Sick/injured birds are treated/culled on a daily basis
★	❒	8.1	You must inform the CFIA and your provincial board if a reportable disease is suspected or confirmed on your farm
	❒	8.2	Dead birds are removed daily and disposed of properly
	❒	8.2	Medications are withdrawn according to prescription before processing
	❒	8.2	Feed lines run empty and water lines flushed when a medication with a withdrawal period is used during the finishing period
	❒	9.1	Information from processor must be used to determine feed withdrawal times
	❒	9.2	Catching is performed to minimize loss
	❒	9.3/6.5	Flock sheet sent to processor 3-4 days before processing and fully completed on day of processing
	❒	10.9/10.6	Monitoring, Deviation and Verification Procedures are implemented for the CCP's of the program – Feed Receiving and Treatment with Medications

	√	Manual Reference	Requirement
★	❒	11.1	All SOP record forms (last page of each chapter) or similar have been completed and updated on a minimum yearly basis
★	❒	11.1	Individual Flock Records are completed each cycle. At least 3 flocks of records are completed prior to the first audit and at least one year's worth of records are retained at all times

	√	Manual Reference	Requirement
Highly Recommended			
	❒	x	Allow staff to read Recommended Code of Practice and to understand the concepts of food safety on the farm
	❒	1.1	Controlled Access Zone is 15m around each barn
★	❒	1.2	Entrypoints to the CAZ (i.e. roadways) are identified by a sign or physical barrier
★	❒	1.2	A barrier exists to separate the CAZ from the RA
★	❒	1.3	A diagram has been drawn depicting the CAZ, RA and farm lay-out
	❒	1.3	Visitors wash hands and change clothes before entering the barn
	❒	1.4	Movement is from youngest to oldest birds in a flow through barn
★	❒	1.5	You should not raise other poultry or keep birds as pets
	❒	1.5	Insist that all supplier vehicles entering the farm meet your bio-security codes
	❒	1.6	Equipment cleaned and disinfected before taking them into the Restricted Area after it has been disinfected
	❒	2.2	Feed mill has given written assurance that a quality and food safety control program is used
	❒	2.1	Emergency equipment available to prevent deaths
	❒	3.1	Inside and outside of the feed bin inspected after each flock for feed caking and rust
★	❒	3.3	The barn is washed with water and disinfected after each flock
	❒	3.3	Proper procedures used when cleaning dirt floors
	❒	3.4	The barn rest period, after disinfection, is as long as possible and access is limited to the Restricted Area

	❒	4.1	Bedding materials are purchased from a supplier with a control program
	❒	4.1	Bedding material is stored in a dry, covered location covered by a pest control program
★	❒	5.1	Written assurance regarding the dosage level of vaccinations is provided by the hatchery, if applicable
	❒	5.1	Buy chicks from federally-registered hatcheries recognized by the CFIA as operating under HACCP
	❒	5.4	A separate crew than the hatchery places the chicks
	❒	6.2	Medications and feed additives are purchased from companies with control programs
	❒	6.2	A plan has been developed as to how to deal with products delivered to the farm that do not meet specifications
	❒	6.3/6.4	All options should be considered with the veterinarian prior to using medications in an extra/off-label manner – only medications approved for poultry should be used
	❒	7.2	A humidity gauge is used in each barn
	❒	7.3	Barns are equipped with a stand-by power system

1 Controlling Access to the Farm

Infectious agents - viruses, bacteria, fungi and parasites - can attack your chickens. They can reduce your returns and they can threaten consumer confidence in your product. People, pets, birds, rodents, and other animals can all be carriers. The first line of defence for your flocks is to limit what comes into contact with them.

You should have two zones of protection:

- a Controlled-Access Zone (CAZ) around the outside of the barns that includes the feed and fuel tanks
- a Restricted Area (RA) inside the barn.

This doubles the safety of your flock: Once the zones are in place, make sure people respect them. Insist that they follow your rules to the letter.

a. Creating a Controlled-Access Zone

A Controlled-Access Zone will help you break the cycle of contact between the outside environment and your birds. This reduces the risk of bacterial and disease transfer to your flock.

Limit access to the facilities inside this zone. You should only let people enter who are essential for an effective operation. Discourage visitors and keep them to a minimum. No livestock should be permitted inside the Controlled-Access Zone.

MD

Decide what part of your farm is to be included within your Controlled-Access Zone. The perimeter must include the barn as well as the fuel and feed tanks. Manure storage areas must be outside of the zone with contained drainage, in compliance with provincial and municipal by-laws.

HR

The layout of your farm site and the location of your barns will have a big influence on how you design your Controlled-Access Zone. Within the limits your site sets, it is highly recommended that the zone be at least 15 metres (15 m) around each barn, (manure storage areas must be outside of the zone).

All manure should be stored at least 15 m away from the barn. This is a grandfather clause indicating that all new barns should be built to incorporate a 15m Controlled Access Zone.

If manure is currently stored in the 15m zone:

- Manure should be moved as soon as possible; however the duration of storage depends on the time of year. Storage should be for the least amount of time possible; manure should be moved right away in the summer but can sit longer in the winter, if needed,
- Manure should be moved immediately if there was a disease outbreak in the previous flock,
- Manure should be stored on a cement pad that slopes away from the barn,
- Manure should be stored 15 m away if no cement pad is being used,
- The space between the barn and the manure pad should be clear of manure.

Note: Manure should not be completely covered because it is a combustible material. If manure is kept covered, ensure there is adequate ventilation.

★ HR

On the farm, you should also clearly identify the access/entry points (i.e. roadways) to the Controlled-Access Zone by a sign or physical barrier. If possible, put up a physical barrier such as a fence or gate. The CAZ should be identified so that people entering the farm know where they are not allowed to have access to.

Everyone who enters the Controlled-Access Zone (staff and any necessary visitors) should all follow the same rules. At the very least, anyone who has recently been in contact with other poultry or livestock (i.e. the same day) should wash their hands thoroughly and change into clean clothes and footwear before they enter the zone.

b. Setting Up the Restricted Area Inside the Barn

The goal of the Restricted Area inside the barn is the same as for the Controlled-Access Zone. You want to reduce the chance that any potential carrier of infectious agents will come into contact with your flock. This includes people, animals and birds.

MD

Producers must post signs at the farm to warn people that entrance to the barn area is restricted. The signs should be easy to read.

Barn doors and other entrances to the Restricted Area must be kept locked in order to restrict access into the barn.

★ HR

Inside the buildings' workroom or entry, establish a barrier that people must cross to enter the RA. A step-over, a door or some other physical barrier should be used to maintain separation between the CAZ and the RA by establishing a designated area for staff and visitors to change footwear, coveralls etc. At the very least, it should be a clearly identified line.

★ HR

Each farm should design/draw a diagram to indicate the location of the CAZ and the RA. This diagram should include the barn and entry room, the layout of the property including roadways, feed bins etc. and a clear distinction of where the two control zones are located. This diagram will help to educate workers and visitors about the different zones on the farm.

i) People

★ MD

All visitors accessing the Restricted Area inside the barn must sign the visitors' log book containing date, name and previous poultry contact and this must be kept in the flock file or in the main yearly file. This includes individuals such as veterinarians, suppliers and the lead catcher. Catching crews can be recorded on live haul sheets, or similar.

Each farmer is responsible for maintaining records to be able to track movements on and off the farm in the case of an emergency.

Visitors and workers must follow the farmers' shoe or boot biosecurity procedure before entering the barn.

You must only allow people (workers and visitors) who have followed the outlined procedures below to enter the barn. The following procedures should be adhered to once the barn is cleaned and disinfected and during the grow-out period:

★ MD

- Farmers and all people entering the barn, prior to final catch, must take precautions not to carry pathogens from outside the barn into the barn by way of their boots. This can be accomplished by having a dedicated pair of boots at each barn or by another acceptable means (e.g. plastic/disposable boots). A footbath is not an acceptable method of decreasing the risk of contamination.

  If not changed daily or when contaminated with organic material, foot baths are not an effective barrier to bacteria or disease. With repeated use, foot baths have been proven to provide a perfect breeding environment for bacteria. Dirty foot baths ensure that bacteria will spread from the environment outside to inside the barn.

MD

- You must not allow common contact such as stocking feet between the restricted and unrestricted areas inside the barn.

HR

- Wash hands with soap and water. Dry them with disposable paper towels. If this is not possible, people may wash with an alcohol-based sanitizer, pre-packaged towelette, etc.

HR

- Change into coveralls or a lab-type coat and put on a hat or bonnet before crossing the barrier to enter the restricted area of the barn. These should be stored in the Controlled-Access Zone, (i.e. they should not be worn outside of the Controlled-Access Zone).

★ MD

- Suppliers (e.g. feed truck drivers) must not enter the CAZ inside the barn unless access is absolutely necessary. If it is necessary to enter the RA, the strictest biosecurity measures must be followed to ensure the cycle of disease is broken.

Visitors or service personnel should not be allowed into the Restricted Area:

- if they have recently been in contact with a diseased flock
- after the barn has been cleaned and disinfected
- unless emergency situations require that service personnel access the Restricted Area when birds are in the barn

★ MD

The farm manager or employee must accompany visitors when accessing barns to ensure that biosecurity is respected; alternatively the farm manager must be confident that the visitor has been educated on the farm's biosecurity protocol.

You should keep spare clothing, hats, masks, etc. on hand for visitors. When they need them, you should also make dust masks available. Each barn should be equipped with a dedicated pair of coveralls for use by the farmer and farm employees.

To avoid exciting the birds, you should make sure that people wear similar clothing in the barn at all times during the production cycle.

HR

Some farms will have a flow-through barn or have a multi-stage grow-out operation within the same Restricted Area. In this case, you should insist that all staff move from the youngest to the oldest birds as part of their normal routine - never from oldest to youngest. When moving from one section to another, they should wash their hands and change clothing at each stage as outlined above.

ii) Non-Humans

MD

Wild birds, rodents and insects must be prevented from entering the barn. You must have a documented pest control program and never allow pets in the barns.

Keep the work areas neat and tidy to help eliminate breeding areas for insects and rodents.

As a minimum standard, you must follow these maintenance routines:

- patch gaps under the eaves to prevent birds from nesting or entering the barn

MD

- repair damaged screens promptly
- cut weeds and grass regularly within the CAZ. This makes the area around the barn less attractive to rodents, as would a strip of gravel or crushed rock,
- keep the area around the barn clean, tidy and free of general rubbish,
- fill or level any low areas where water could stagnate. This removes breeding areas for insects that could carry bacteria,
- clean up feed spilled below bins or augers immediately.

You should finish all repairs to the exterior of the barn before you clean and disinfect inside. This will keep animals and birds out and lower the risk of recontamination after clean out.

★ HR

You should not raise other poultry or birds, especially waterfowl, on the same farm site as chickens. Staff or owners should never keep birds as pets.

★ MD

If a farmer or farm employee is involved in, or comes in contact with, another type of commercial poultry operation, adequate biosecurity measures must be in place and described in the farmers' standard operating procedures (SOP's).

c. Access by Vehicles

i) Service Vehicles

You should restrict unnecessary traffic into the Controlled-Access Zone. Clearly, vehicles delivering essential supplies such as fuel, litter, feed, chicks or other materials have to enter the Controlled-Access Zone. Similarly, those transporting birds or manure from the barn(s) may enter. You should not allow any other vehicles inside the Controlled-Access Zone.

HR

You should insist that vehicles coming from suppliers (i.e. fuel, electrical, litter) that do not have a HACCP program that covers on-farm biosecurity follow your biosecurity codes of operation. For suppliers with a HACCP program (i.e. feed mills and hatcheries), you should insist that they follow their own codes of practice. Ask your suppliers and processor what practices their employees have been told to follow to ensure they meet your biosecurity codes.

(ii) Farm Equipment

HR

If you need to access the barn after it has been disinfected, you should clean and disinfect all equipment before you take them inside the Restricted Area. Dirty equipment can cross-contaminate or re-contaminate the barn.

d. Farm Layout and Barn Design

i) Site Design

When laying out a new poultry farmstead, you should allow for a Controlled-Access Zone. You should also consider easy access for vehicles in your layout.

ii) Barn Design

You can improve the humane handling of your birds through proper building design and easy accessibility for load outs. You should include the following features:

- easy access to loading and unloading areas of the barns.
- loading and unloading areas and ramps that allow the shipping crew to handle the birds properly. Your design should minimize the needless transfer of the birds between handlers.
- a floor opening through which people can pass birds safely. There should be no obstructions, such as floor joists, to interfere with bird transfers.

All work areas should be designed to have a specific, limited function serving the needs of your grow-out operation. You should include an area for washing up. The design should also make it easy for your staff to set up and maintain a Controlled-Access Zone.

You should avoid planning to store unnecessary materials within the work area. Try to keep storage areas outside of the barn(s) to keep the risk of contamination as low as possible.

SOP 1

To be reviewed annually and updated as necessary (To be signed and dated every time)

CONTROLLING FARM ACCESS

1. Do you keep the barn locked and require visitors in the RA to sign a log book?
   Yes ____ **No** _____

2. Have you drawn a diagram of your farm site indicating the RA and the CAZ?
   Yes ____ **No** _____

3. Security of poultry premises: buildings & facilities (signs included) visually inspected for good repair **Date** _____ **m/yr**

4. What type of protective clothing do you have available for visitors?
   - ❒ Boots ❒ Coveralls ❒ Hats/Bonnets
   - ❒ Disposable boots ❒ Masks
   - ❒ Other: _____

5. Do you require your visitors to indicate their previous farm contact (i.e. the same day)? **Yes** _____ **No** _____

6. Describe your biosecurity protocol if you come into contact with another type of poultry operation

   _____

   _____

PEST CONTROL

Pest Situation Analysis:

Rate pest problems in previous year: (none, some, lots)

Rodents _____ Wild Birds _____ Flies _____ Beetles _____ Other Pests _____

Pest Control on the Farm:

1. What type of pest control program do you have in place?

   _____

   _____

   _____

2. Are weeds, equipment and debris kept away from the exterior of the growing facility? **Yes** _____ **No** _____

Signature _____ **Date** _____ **m/yr**
Signature _____ **Date** _____ **m/yr**
Signature _____ **Date** _____ **m/yr**

2 Access to Space, Feed and Water

a. Floor Space and Density

Throughout the full production cycle, chickens should have freedom of movement. They should have enough room to stand normally, turn around and stretch their wings without difficulty.

i) Feeders:

Under normal circumstances, you should present feed to all chickens on a regular, daily basis. When you use feeding restrictions, do not interrupt feeding for more than 24 hours.

Follow your manufacturer's recommendations to assess feeder space.

ii) Drinkers:

Chickens should have access to water from an uncontaminated and fresh source at all times. Nipple-type drinkers give better control than fountains, cups or open troughs. The temperature of the water should not exceed 30°C (86°F).

Remember to consider the temperature inside the barn when the water supply is interrupted. The guidelines are as follows:

Barn temperature	Maximum allowable interruption
26°C (80°F)	12 hours
28°C (84°F)	6 hours
30°C (86°F)	2 hours

Establish and maintain a proper ratio of birds to drinkers. In general, the ratio of birds to drinkers should get smaller as the birds grow.

Be sure to follow the manufacturer's guidelines when you set your bird to drinker ratios and when you install a drinker system.

b. Emergency Situations

HR

Equipment breakdown on the farm or external power failures can cause emergencies. You should have emergency equipment to prevent deaths by starvation, dehydration or suffocation whenever normal supplies of feed, water or air are interrupted.

c. Feed and Feeding Systems

i) Feed Supply:

HR

It is very important to keep feed free from contamination. When pelletized feed is processed properly, the heat treatment helps eliminate certain bacteria such as Salmonella. It is preferred that producers use feed of this standard. If you are mixing your own feed, you should take steps to minimize the risk of contamination.

ii) If You Buy from Feed Mills:

HR

Buy your feed from a mill that has a quality and food safety control program in place similar to the Good Manufacturing Practices (GMP) of the Animal Nutrition Association of Canada. Ask the mill to provide you with written confirmation on the invoice or in a separate letter.

MD

If you add an ingredient to complete or supplement your commercial feed, please follow the procedures suggested in iii) below.

iii) If You Mix Feed on-Farm:

MD

Develop a control program for your feed mixing operation. Special measures are needed to prevent bacterial contamination and to control the risk associated with handling medicated products (i.e. contamination of non-medicated feed with medicated feed) and in proper mixing of medicated products. In your control program, you must address the critical control points recommended by the Animal Nutrition Association of Canada and the Canadian Food Inspection Agency. The focus must primarily be on the following four critical control points:

a) weighing the correct quantity of the appropriate medication
b) proper mixing of medications in the feed
c) prevention of cross contamination
d) adherence to withdrawal times if required

Note: This information for mixing feed on-farm will change once the new on-farm feed mixing regulations regarding process controls are available from the CFIA.

★ **MD**

If you mix complete feed on-farm, you must take a sample of the finished product (see vi) Feed Receiving below). The sample must be kept for 2 weeks after the flock has been marketed.

MD

If you add an ingredient to complete your feed (e.g., wheat), you must take a sample for potential contamination (e.g., toxins) before each load is used. The sample must be kept for 2 weeks after the flock has been marketed. Samples need only be tested if necessary; otherwise they are to be discarded. Record the addition of the ingredient.

iv) Farm to Farm Transfer:

You should not accept any transfers of leftover feed from other farms. Leftover feed must be either sent back to the feed mill for reprocessing when the supplier has acknowledged that it has the procedures/processes in place to manage this, transferred to another farmer or stored until the next time this type of feed is required. A food safety risk associated with left-over feed is that there may unknowingly be antibiotics in the feed with a withdrawal period – therefore there is the potential for antibiotic residues.

★ MD

Feed transfers can occur between two farmers where feed bins are under common management protocols and where a control program is used to ensure the feed does not present a food safety risk. As a minimum standard, you must:

- Keep a log of transferred feed that includes the items listed in the example record below.
- Take a sample of the feed before it is transferred to the receiving bin. This sample must be kept until at least 14 days after the flock has been shipped.
- Only transfer feed from the feed bin; no feed from either inside the barn or outside of the feed bin can be transferred.
- Be able to provide documentation that cleaning of the original feed bin followed the protocol listed on page 3.1 of this manual.

Example of record:

Date Moved	Jan. 23/02
Type of Feed	Finisher
Original Location	Barn #2, Bin #1
Transferred To	Barn #5, Bin #1
Medication with withdrawal periods used in the flock (list withdrawal times)	none
Method of Transport	Truck #1
Sample Taken	✓
Management Protocol of the original feed bin	*Inspected after the last flock, *Two-bin system: emptied before new feed delivered

To minimize the quantity of leftover feed, it is suggested that:

a) the feed inventory be closely monitored
b) the amount of feed ordered be calculated based on the flocks' expected consumption

By minimizing the amount of leftover feed, the remaining feed can either be bagged or be stored on farm in separate bins.

The other alternative, which is increasingly popular, is the installation of a second bin. This has not only the advantage of solving the problem of leftover feed, and maintaining a certain quantity of feed on-farm to avoid shortages but also simplifies the transition from one type of feed to another. The latter approach constitutes, in the HACCP environment, an additional control to ensure adequate withdrawal periods are respected when certain medicated feeds are used.

v) Feed Handling

MD

Each load of feed or feed ingredient must be stored in clearly-identified closed bins or in tanks to prevent microbial contamination. This prevents moisture build-up and keeps rodents and wild birds away from your chickens' ration.

Store feeding trays and the paper you use with new flocks away from the production facilities. The storage area should be clean, dry and secure. Again, this prevents microbial contamination from previous flocks, as well as moisture build-up and also prevents contamination by rodents, wild birds, or insects.

Construct feed bins of materials that do not let feed build up on the inside or outside surfaces.

MD

As a minimum standard, you must:

- Inspect bin for leaks of feed and rain after each flock.
- Inspect the inside and outside of the feed bin at least once a year for feed caking and rust.
- Empty and thoroughly clean the feed bin boots and feeding systems (augers and lines) between flocks. To prevent freezing during inclement weather, run starter feed through the system right after the first delivery of feed before the chicks are placed.

vi) Feed Receiving (Critical Control Point)

From a food safety perspective, the feed you receive is very important. The feed sampling protocol is intended to reduce the potential for cross-contamination between medicated and non-medicated feeds as well as to reduce the use of contaminated feeds.

★ MD

An inspection of all feed delivered to the farm must occur to check if the proper feed has been delivered and that there are no visible signs of mold or contamination. Record form CCP 2A, or similar, must be completed for each flock.

The feed sampling method is dependent on the type of feed used – either non-medicated feed, medicated feed with a withdrawal period or medicated feed without a withdrawal period – and on the control methods that are being used on-farm to eliminate cross-contamination between medicated and non-medicated feeds (i.e. single bin vs. double bin systems).

★ MD

Each bill of lading must be checked for medications with withdrawal periods. See Table 2.1 for withdrawal periods for some of the most common medications found in poultry feed.

★ MD

Feed Sampling Protocols

Type of Feed	Method #1 One sample of feed must be taken from each load of feed delivered during the grow-out period	Method #2 One sample from each load delivered in the last two weeks of the cycle & One sample from the in-barn hopper every second day in the last two weeks of the cycle
• Non-medicated feed	X	
• Medicated feed without a withdrawal period	X	
Medicated feed with a withdrawal period		
• No cross-contamination control methods used		X
• Cross-contamination control methods used	X	

Non-Medicated Feed and Medicated Feed without a Withdrawal Period

★ MD

If non-medicated feed or feed using a medication without a withdrawal period is used throughout the entire grow-out cycle, then the following sampling protocol must be used:

- One sample of feed must be taken from each load of feed delivered during the grow-out period.

Medicated Feed with a Withdrawal Period

★

When a medicated feed with a withdrawal period is used at any time throughout the grow-out, control methods must be used in order to ensure that there is no cross-contamination between the medicated feed and the non-medicated feed.

★

The following control measures must be used:

- A rubber mallet must be used to knock the sides of the feed bin to ensure that there is no feed build-up before each new load of feed is delivered.
- A complete emptying of the feeding system including the feed bin (i.e. nothing sitting in the bottom/cone) and the auger must take place before switching from the medicated feed to the non-medicated feed.
  - For a double bin system, this can be performed by not blending the two bins, by running the auger and the feed bin containing medicated feed empty prior to starting the non-medicated feed or by ensuring the medicated feed bin is closed off.
  - With a single-bin system, the bin and auger will need to be emptied prior to switching to feed without a withdrawal period. This complete emptying of the bin reduces the risk of any medication carryover; however, the welfare of the birds should not be put at risk.
- A record must be kept (on form CCP 2A) of when complete emptying of the feeding system including bin and auger were completed.

If the preceeding control measures are practiced on-farm, then the sampling protocol is as follows:

- One sample of feed must be taken from each load of feed delivered during the grow-out period.

★

If these control measures cannot be put in place on-farm, then the risk of cross contamination is increased and the following method must be used:

- One sample of feed must be taken from each load of feed delivered during the last two weeks of the grow-out cycle.

MD

- In addition, one sample must be taken from the in-barn hoppers every other day in the last two weeks of the grow-out cycle. You must start sampling at fourteen days before the scheduled processing date. You must then take a sample every other day (at 14, 12, 10, 8, 6, 4 and 2 days before processing). Record on Form CPP 2B that each sample was collected and any corrective actions that needed to be taken.

Feed Sampling

- All samples need to be inspected, a record needs to be kept that the sample was taken (Form CCP 2A & 2B) and the sample must be stored in a cool, dry and secure location until 14 days after the birds have been shipped to the processing plant. The sample must be identified with, at the minimum, the date, feed description and barn number.
- To obtain a representative sample, take samples at a number of different locations (i.e. 5) or at a number of different intervals during the delivery of feed. A sample size of approximately 500g (a sandwich bag) is sufficient.
- At the bottom of form CCP 2A, a short checklist provides a quick summary of the control activities you need to take for feed during the life of the flock.

Helpful hint: Keep the samples for the full cycle of the next flock – keeping the samples for a longer period of time is recommended to allow for residue testing as well as frozen and further processed products.

Farmers should be aware that, depending on the type of ingredients contained in their feed, feed samples may discolour over time because of oxidation. This discoloration is not indicative of a sub-standard quality level of the feed delivered.

Table 2.1: Withdrawal Periods for Common Medications in Poultry Feed

Feed Medication	Minimum Withdrawal (Days)
Avatec	0
Clinacox	0
Coban/Monensin	0
Coxistac 12%/Sacox 120	0
Cygro	**5**
Maxiban	**4**
Monteban	0
Nicarb	**4**
Salinomycin 60/Coxistac 6%	0
Stenorol	**5**
Flavomycin	0
Lincomix	0
3-Nitro 20%	**5**
Stafac/Virginiamycin 44	0
BMD	0

*Compendium of Veterinary Products, 2005

d. Potable Water and Watering Systems

You should make sure that your potable water source is kept clean. You should not use untreated surface water from ponds, lakes, streams, rivers or dugouts. You should not allow wild birds or waterfowl access to the water source.

A closed watering system (e.g. nipple drinkers) is preferable to an open system (e.g. bell type or trough). Closed systems provide an environment that is less hospitable to bacterial growth.

i) Cleaning and Disinfecting Water Lines

MD

You must flush your water lines under full water pressure in between flocks.

Enclosed lines should be flushed under full pressure on a minimum weekly basis to inhibit bacteria growth and to prevent build-up. In addition, flushing is recommended after any addition to the lines (medication, etc.) to prevent residues and bio-film build-up.

★ MD

Water lines must be cleaned or disinfected between flocks if a cleaning or disinfection program has not been used during the cycle of the flock. The recommended cleaning and disinfecting procedure is described below.

MD

You must disinfect open drinker systems and let them dry before using them again.

★ MD

If using a disinfectant that requires prior use of a cleaner as per the manufacturers' label, then a cleaner must be used prior to the use of the disinfectant.

The effectiveness of disinfectants is severely reduced in the presence of organic matter. Cleaning solution concentrations should be adjusted based on water pH. To avoid damage, consult the water line manufacturers' recommendations.

Recommended Cleaning Procedure:

1) flush water lines under full pressure
2) fill the lines with cleaning solution and let sit as per label recommendations
3) flush the lines with clean water
4) apply a disinfectant and let sit as per label recommendations
5) flush lines with clean water

The following tables can be used as guidelines for cleaning and disinfecting water lines. Always use products according to label instructions.

Table #1 Cleaning and Disinfecting between Flocks

	Proportioner (1 oz per gallon)	Bulk Tank
Cleaners		
Citric Acid	4-5 packs* per gallon water or per 3.8 L water	4-5 packs* in 128 gal water or per 485 L water
Vinegar	No dilution needed	1 gal in 128 gal or 3.8 L in 485 L water
Disinfectants		
Chlorine 5%	12 oz per gallon water or 940 mL in 10L water	12 oz in 128 gal water or 880 mL in 1200L water

* 205 g/pack; do not use when birds are present

Table #2 Cleaning and Sanitizing when Birds are Present*

	Proportioner (1 oz per gallon)	Bulk Tank
Cleaners		
Citric Acid	200 grams per gal of water or 500 grams in 9 liters of water	200 grams in 128 gal water or 500 grams in 1200 liters water
Vinegar	0.5 gal per gal water or 500 mL per liter of water	0.5 gal in 128 gal water or 5 liters in 1250 liters of water
Disinfectants		
Peroxide 35%	0.5-1.0 oz per gallon water or 40-80 mL in 10L water	0.5-1.0 oz per gallon water or 37-73 mL in 1200L water
Chlorine 12%	0.5 oz per gallon water or 40 mL in 10 L water	0.5 oz per 128 gallon water or 30 mL in 1000 L water
Iodine 18.5%	12 oz per gallon of water or .95 L per 10 L water	12 oz per 128 gallon of water or .915 L in 1250 L water
Chlorine 5%	1.5-5 oz per gallon of water or 117-390 mL in 10 L water	1.5-5 oz per 128 gallon of water or 100-366 mL in 1200 L water

*These concentrations are safe for birds to consume. Monitor flock performance when using these recommendations.

★ MD

If treatment of the water system is used during the grow-out, the water treatment system (chlorination, ozone, etc.) must be adjusted as per manufacturer recommendations.

- The type of product used and the concentration must be recorded on CCP-1.
- The concentration of the treatment must be verified and recorded weekly on form CCP-1. The verification can be performed by testing the concentration of chlorine at the end of the drinking line (i.e. by using chlorine test strips or another suitable method).
- The precision of the water treatment system must be verified yearly as per manufacturers' instructions (or using the protocol under iii) Medicators).

Water quality is critically important to your operations. To ensure continuous quality, the turbidity or cloudiness of the water must be examined on a minimum weekly basis while the presence for slime and mold must be checked daily. These activities are to be recorded on CCP-1, or similar.

ii) Bacteriological and chemical analysis

As a minimum standard you must:

★ MD

- Test all water sources used for chicken production annually. Analysis must be performed at provincial or municipal public health laboratories or at private laboratories recognized by provincial health authorities.

Bacteriological analysis:

★ MD

- A bacteriological analysis must be performed on an annual basis. The analysis must include an enumeration of total coliforms per 100 mL and faecal coliforms (E. coli).

Chemical analysis:

MD

- The local health authorities must be contacted to check if there is a mandatory requirement for chemical analysis in your area. If you are using a municipal water source, this check does not have to be performed since chemical analysis is carried out at the source.

If you find contamination or bacteria, consult with a competent authority or a regulator about what you must do to correct the problem.

Minimum acceptable bacteriological standards

The objective level is no coliforms per 100 mL of water and less than 500 organisms per mL. However, water may be considered bacteriologically acceptable provided the following tolerances are not exceeded:

i) no sample contains more than 10 total coliforms per 100 mL of water
ii) none of the coliform organisms detected are faecal coliforms

iii) Medicators

★ MD

Water medicators must be tested before each time a medication is administered and at least once per year if the medicator is only used for disinfection. The results of the tests, the method of testing, any deviations and subsequent repairs must be recorded. Record this activity on CCP 1 or equivalent.

The following calibration is one method to perform these tests; other calibration protocols (i.e. manufacturers' recommendations) can also be used to test accuracy.

1. Disconnect the outflow side of the medicator from the water line (usually connected by a union or a "quick connect" coupler).
2. Use a measuring cup that measures mL and fill with water.
3. Place the end of the medicator intake tube into the measuring cup, place a pail under the outflow of the medicator, and turn on the water supply through the medicator.
4. If the correct amounts are disappearing out of the measuring cup, then the water medicator is working properly. If not, your medicator needs servicing.

To be reviewed annually or whenever necessary. (To be signed and dated every time.)

SOP 2 FEED AND WATER ACCESS

Equipment specifications on file (feed/drinkers/ventilation)
Location of files:

_____
_____
_____

Feed

- ❒ Do you have written confirmation from your feed mill about their food safety program? **Yes** _____ **No** _____
- ❒ Pelletted
- ❒ Mashed
- ❒ Do you have a control program for your on-farm feed mixing operation?
  Yes _____ **No** _____ **N/A** _____
- ❒ Do you have control measures in place to minimize the quantity of leftover feed?
  Yes _____ **No** _____

Record bin identification

_____
_____
_____

Water quality

Date of water analysis _____
(results to be kept on file)

Corrective maintenance (if necessary) _____
_____
_____
_____

- ❒ Do you have a control method to ensure the accuracy of the water treatment system?
  Yes _____ **No** _____

Signature _____ **Date** _____ **m/yr**
Signature _____ **Date** _____ **m/yr**
Signature _____ **Date** _____ **m/yr**

3 Cleaning and Disinfecting

To raise clean, quality chickens, you have to have a clean environment. Cleaning and disinfecting the barn are the keys to breaking the cycle of contamination.

Disinfectants do not work well unless the barn is clean first. You should have effective cleaning procedures. You should follow cleaning with your disinfecting program. If you do not, you will not break the contamination cycle.

You must:

MD

- Clean and disinfect your barn thoroughly (complete washing) after a disease outbreak that required depopulation.

a. Barn Exteriors and Equipment:

MD

You must clean (remove build-up), wash and disinfect the fans regularly, when this is practical. Plan for the ease of cleaning when you are thinking about replacing fans or about beginning new construction.

You must:

- Keep the barn exterior and equipment clean; use any method suitable to remove dust build-up as necessary. Pay attention around the windows, doors, feed bin areas and air intakes.
- Empty and thoroughly clean the feed bin boots and feeding systems (augers and lines) between flocks. To prevent freezing during inclement weather, run starter feed through the system right after the first delivery of feed before the chicks are placed.
- The inside and outside of the feed bin and parts of the feeding system outside the barn must be inspected at least once a year for feed caking and rust. If feed caking or rust exists, the proper personnel must be contacted to clean or fix the system. Cleaning can be performed using either high-pressured air, sweeping the inside of the bin or by another suitable method.

HR

- The inside and outside of the feed bin and parts of the feeding system outside the barn should be inspected for feed caking and rust after each flock when circumstances permit. The feed bin is a critical part in reducing feed contamination and must be kept free of caked feed and/or medicated feed residues.

- You should not enter the feed bin at any time. For personal safety, use a safety harness when inspecting the inside of the feed bins and take all safety precautions necessary to avoid an accident.

b. Barn Interiors and Equipment:

You should routinely clean (remove dust/debris etc.) workrooms and entryways. This reduces the risk of contamination and gives staff a safe working environment.

At a minimum, you must:

MD

- Clean (see (i) below) each barn thoroughly after each flock. Do this as soon as possible after the flock is loaded out. You must plan to have the barn empty, but ready for the new flock for the longest possible time.

Although not requested at present, be aware that eventually, you will have to prove that you are contributing to the industry pathogen reduction effort. In order to do so, the scientific approach suggests that you should have each barn tested for bacterial pathogens during the growth period and after cleaning and disinfecting. This will provide you with your flock microbial status, allow you to assess the validity of any corrective actions taken and to assess the effectiveness of your cleaning and disinfecting.

i) Cleaning

MD

You must clean inside the barn after each flock. There are two stages in a thorough interior cleaning.

1. Manure removal: You must remove the manure from inside the barn immediately after shipping. Store according to your provincial environmental regulations or far enough away so that no possible contamination to water sources, feed or barns can occur.

    - The further you keep your stockpile from the barn, the better. Ensure that the area between the barn and the storage area after you finish cleaning out the barn is free of manure.

★ MD

- A cleaning requires that all organic material be removed (ie. blown or brushed) from the floors, walls, ceilings, fans and equipment.

MD

- All rooms in the barn (i.e. electrical/office) must be cleaned (remove dust/debris etc.) as thoroughly as possible.

MD

2. Complete washing: A complete clean-up must include, season permitting, a thorough washing of the floors, walls, ceilings and equipment with water under high pressure. Washing of barn and equipment must take place at least once a year.

★ HR

A complete washing of the barn with water under high pressure (as described in the previous section), followed by a disinfection (as described in the following section) is highly recommended to be performed after each flock.

You should dispose of manure safely. Good environmental citizenship builds a good public image for chicken farmers and for chicken. You should establish a manure management plan. Review it regularly. Get to know the provincial and municipal codes (Agriculture, Environment, etc.) that apply in your area. Follow them carefully.

Composted manure is more environmentally friendly and more easily stored. It may also be a valuable by-product. You should explore this alternative when you create and review your manure management plan.

At the very least, you must:

MD

- ensure manure storage sites meet provincial or municipal codes. When practical, place them downwind of the barns. Take steps to minimize the dust intake to the barns from the storage site.

★

- not spread manure in the controlled-access zone.

HR

Dirt floors are virtually impossible to clean or disinfect. You should replace them if at all possible. If you cannot, you should remove the first centimeter of dirt each time you clean out. Replace it with new material. Dirt floors should not be incorporated into the design of a new barn.

ii) Disinfecting

You must disinfect:

★ MD

- The barn at least once per year and this must be after the barn has been washed with water. This includes all walls, ceilings, rafters, fans, air intakes, and equipment and machinery such as feeders, hoppers, feeding chains, etc. You can do this either with a disinfectant wash or by fumigating.

★ MD

- Water lines must be cleaned or disinfected between flocks if a cleaning or disinfection program has not been used during the cycle of the flock. It is recommended to use the cleaning and disinfecting procedures as listed on page 2.9. Use an adequate flush period to protect your watering system.

Avoid recontamination. Dry equipment and barn interiors as quickly as possible.

MD

You must clean (remove organic matter) and disinfect all equipment used in the clean-out after the clean-out is completed.

Dispose of any residues according to environmental regulations.

iii) Rest period

HR

A rest period optimizes the sanitations protocol. The rest period allows for the destruction of micro-organisms which could have survived the disinfection/fumigation process, but are susceptible to natural dehydration/desiccation.

The period after disinfection and before the next flock needs to be as long as is possible:

- Cleaning and disinfecting should take placed as soon as the flock has been shipped in order to maximize the rest period.
- All access to the barn should be minimized after disinfection to avoid re-contamination.

c. Flow-Through Barns

To control the spread of disease between flocks, an all-in all-out system is highly recommended. Flow-through barns with different aged birds need to be managed effectively to ensure disease outbreaks are controlled.

★ MD

In a flow through barn you must ensure that:

- All cleaning and disinfecting procedures and rest periods are adhered to in each section, as they are described in this manual.
- Biosecurity measures are in place to avoid contamination between different aged birds.
- In-barn procedures limit the spread and ability for cross-contamination of pathogens.

SOP 3

To be reviewed annually or whenever necessary. (To be signed and dated every time.)

MANURE MANAGEMENT

❒ Describe your manure management plan

_____

_____

_____

CLEANING AND DISINFECTION PROCEDURES

❒ Describe how you, or the cleaning crew, clean and disinfect your barn

_____

_____

_____

_____

_____

_____

_____

_____

_____

❒ If the cleaning and/or disinfection is contracted out, insert the contract at the end of this section or inscribe

Cleaning firm name _____

Address _____

Telephone number _____

Signature _____ Date _____ m/yr

Signature _____ Date _____ m/yr

Signature _____ Date _____ m/yr

NOTE: Description of procedures may be made on separate pages.

4 Bedding Materials [Litter]

Be careful not to bring contamination into the barn in bedding materials. These include shavings, straw, shredded paper and the like. Take steps to make sure that these are as free from impurities as possible. The risk varies, depending on the type of material.

HR

If you buy bedding materials, check that the supplier has a control program to keep the material clean. The program should apply both during storage and during delivery. You should insist that the suppliers' delivery trucks follow your procedures for service vehicles.

★ **MD**

Upon placement in the barn, the litter must be checked for mold, feathers and bird droppings and this activity must be recorded (use GPP2 or similar).

HR

It is highly recommended that bedding material be stored in a dry, covered place with limited access to wild birds. The storage premises should be included on your rodent control program.

When spreading bedding materials in the barn, take great care not to re-contaminate the barn.

SOP 4 ANNUAL REVIEW

COMMENTS

5 Chicks

a. Purchasing

HR

You should only buy chicks from federally-registered hatcheries recognized by the Canadian Food Inspection Agency (CFIA). Furthermore, it is recommended that you buy from hatcheries recognized by the CFIA as operating under HACCP. When available, the CFIA hatchery license or the HACCP Recognition Certificate should be presented upon request when dealing with your hatchery operator.

Further to your discussions with your chick supplier, the following information must accompany each lot delivered to your farm.

i) Vaccines Received at the Hatchery

★ MD

Written assurance regarding the vaccination history (type of vaccines administered) must be provided on the invoice slip, or attached to the invoice slip, by the hatchery operator. This information is required on the flock sheet, which will be forwarded to the processing plant.

★ HR

Obtaining written assurance from the hatchery operator regarding the dosage level of vaccines is highly recommended. This information can be helpful to allow you to adequately manage your flock during the grow-out period.

ii) Treatment Received Including the Withdrawal Period When Applicable

In many cases, day-old chicks are injected with antibiotics at the hatchery level and for some of these drugs, a withdrawal period applies. For instance, in the case of gentamycin, the withdrawal period is thirty (30) days. In other words, this means that chicks treated with that drug cannot be marketed for 30 days.

MD

All medications given at the hatchery level (including the dosage) must appear on the invoice slip.

If farmers produce cornish chickens (sent to market in less than 30 days) they must get written assurance that the day-old chicks have not been injected or exposed to drugs with withdrawal periods. Otherwise, these chickens must not be shipped before 30 days, because of the risk of the presence of antibiotics.

iii) The Age Group of the Breeding Flock(s)

From the beginning of the laying period (approximately 25 weeks of age) to the end of the laying period (approximately 60 weeks of age), a hatching egg supply flock will produce increasingly larger eggs resulting in larger day-old chicks with varying immunity levels depending on the age of the flock of origin.

Since hatchery operators must have supply flocks of different ages to meet a constant demand, they must contend with different sizes of eggs and consequently different sizes of chicks. In order to deliver a large number of chicks of as uniform weight ranges as possible, the general practice in the hatchery industry is to group production by age groups or sizes of birds. For instance, they may group together the eggs/chicks of

- the 24 - 30 week-old breeding flocks (small)
- the 31 - 45 week-old breeding flocks (medium)
- the 46 - 60 week-old breeding flocks (large)

Knowing from which age groups the incoming lot(s) are from may, in cases, influence where the lot(s) would be placed for brooding. For example, the smaller chicks may be placed on the upper floors where it is generally warmer. The age group of the supply flocks must be disclosed to the farmer on the invoice, provided that information is not to be used to require future lots from specified age ranges of the breeder flocks. Pressure by producers to get particular size ranges of chicks would push for a different pricing structure and would most likely result in greater waste at the hatchery level.

iv) Lot Identification

The Canadian hatching egg production structure does not allow for the assembly of a large quantity of chicks of one production unit in order to fill average size Canadian chicken barns. To meet market demands and ship uniformed lots, the Canadian hatchery operators must gather chicks from various supply flocks. For trace-back purposes, flock identification information should appear on the bill of sale (or the bill of lading) to inform the producer of the origin of the chicks. Chicken farmers do not need to know the name of the exact breeder flock or the name of the farm of origin. A coding system that could provide a traceable indication of the origin of the flock is sufficient. This system must be verifiable in such a way that a producer could present any investigating parties, for example the Canadian Food Inspection Agency hatchery inspector in case of health problems or an auditor of this program for audit purposes, with a traceable indication of the origin of the product that came into the barn.

v) Date of Hatching

Operators of modern hatcheries are scheduling their production to ensure that chicks are delivered within working hours on the day they hatch. However, some lots may be rolled over to the next day and/or some chicks may be transported for an increased period of time. Whenever a producer is to receive chicks that have been pulled from the hatchery for more than 12 hours, hatchery operators must inform the producer of the particular status of the incoming chicks. This will allow producers to take appropriate measures to ensure an optimal environment for the incoming flock.

When a problem occurs after placing or during the growing period, additional information must be provided on request. Hatchery operators must keep complete records and pertinent data on all transactions and health-monitored issues for investigations/trace-back purposes and for CFIA inspectors.

b. Barn Preparation

MD

Once the date and time of delivery is obtained from the hatchery, make sure that the barn is ready before the chicks are delivered. The checklists (GPP 2 & 3) must be reviewed and used to ensure that the barn and all the equipment (including the brooders, the feeders and waterers) have been properly cleaned and disinfected to ensure that the barn is ready for placement upon arrival of the chicks.

The following procedures apply:

i) The litter must be clean, soft and dry. An adequate layer is required to absorb the droppings of the chick, except in operations with heated floors. The thickness depends on the type of bedding used.

ii) The temperature must be adjusted in advance to ensure that the body temperature of the chick remains the same from hatchery transfer time, until they can regulate their body temperature.

iii) Drinking lines must be ready to be adjusted. Whenever a producer is notified that he is receiving chicks from the previous day's hatch, he must ensure that an adequate water supply is immediately available for the birds.

c. Delivery

The chicken farmer or one of his/her representatives must always be present at the time of delivery and placement, to make sure that the chicks delivered are in good physical condition. The following quality assessment criteria are used at the hatchery level and are suggested to the producer to be used at the reception of their chicks:

i) Alertness: an alert chick has a wide-open bright eye and appears to be curious.

ii) Vigour: a vigorous chick is instantly active when disturbed and shows no signs of weakness.

iii) Condition: the condition of the chick is evaluated by handling. A chick in good condition is firm, not mushy. The navel is healed, the fluff is not matted and the chick presents no signs of dehydration. Unhealed navels provide an early access route for bacterial infections, resulting in chick losses.

iv) Normality: a normal chick has no apparent deformity and shows no signs of abnormality such as twisted beaks, twisted toes, crippled or straddled legs, etc. There should not be noticeably undersized birds within the lot.

MD

You must inspect your new flock as soon as you get the chicks. Record your observations. You must also check and record the flock condition three to four days into the grow-out period. Make note of any corrective actions you take. You must also inspect your flock at least twice every day that the flock is in the barn. Your observations should also be recorded.

Biosecurity procedures for those penetrating the Restricted Area inside the barn outlined in section 1, “Controlling Access to the Farm”, must be respected.

In order to minimize the risk of introducing contamination inside your clean and disinfected barn, chicken farmers and hatchery employees should adhere to the following procedures at the time of placement:

i) The delivery area should be dry, clean, and free of rubbish and organic material.

ii) Hatchery delivery staff should wear appropriate clean clothing and impervious footwear, which can be cleaned and sanitized upon arrival on the farm.

HR

iii) Ideally, the incoming boxes of chicks should be unloaded outside the Restricted Area by hatchery employees (truck driver and/or employees). A producer crew would then take over placing the chicks in the barn. If the hatchery crew takes part in the placement process within the barn, additional care should be taken to prevent the introduction of foreign contamination.

d. Placement

After the arrival of the chicks:

i) Carefully take the chicks’ boxes directly inside the barn and spread them uniformly throughout the area used for brooding. Keep the boxes level and release the chicks in a humane manner.

ii) Check the initial temperature of the brooding area; it should be 32°C (90°F) at floor level.

iii) Due to transport, chicks are under stress at arrival; clean drinking water and feed must be readily available. Make sure that nipples have been triggered.

e. Brooding

The temperature should be maintained at 30-32°C (86°-90°F) for the first week and then reduced gradually to 18-21°C (64°-70°F) at 6-7 weeks of age. The temperature should be recorded daily at chick level.

Ensure manufacturers' specifications are followed for the feeders and/or feeding pans. The proper feeding of chicks contributes to uniform growth.

SOP 5

Annual Review. (Record to be updated as necessary.)

CHICKS

❒ Hatchery Name and Address

Hatchery name _____

Address _____

_____

HATCHERY

❒ Hatchery Federal register number

Number _____

❒ Is the day-old chick supplier recognized by the Canadian Food Inspection Agency as operating under HACCP?

Yes _____ **No** _____

6 Other Input Materials

You should also consider the other inputs you use in the course of growing a flock. Think about medications, vitamins, pesticides and rodent poisons. Consider the quality of each one that you use. How will using them affect your production efficiency? How will they affect the safety of the final product - chickens?

Some growers may store chemicals such as herbicides, some insecticides and fertilizers, not used in the poultry operation, in or near their poultry barns. If so, they should take care when storing and using them. Farm personnel should be adequately trained in receiving, handling and storing these products.

a. Medications, Vitamins, Feed Additives and Other Chemicals

During the grow-out, you may treat your birds with medications such as vaccines or antibiotics, vitamins or other feed additives. Considerations also apply to rodent and pest control chemicals and/or chemicals to be used in other farming operations.

MD Provincial regulations for purchasing, usage and storage of medications and/ or chemicals must be adhered to.

You must:

MD

- Only purchase and use medications approved for use in chicken. Otherwise, follow procedures under section 6b (page 6.2). Chemicals purchased and used must be approved for use in food animal premises. You must only use these products according to instructions from the manufacturer or your veterinarian. Make sure that your staff is properly trained before you let them give any medication or, if necessary according to provincial regulations, certified before they use any chemical products.
- Check the supplies when they come to the farm. They must come in unopened containers. Each must have a label saying what it is, its concentration and strength. There must be instructions for use. You must keep this information for your records. Verify that the label on the bag coincides with what was ordered.
- Store medications, vitamins and other feed additives in closed containers, according to manufacturer recommendations (follow the label recommendations) and only with compatible products.

★ **MD**

- All chemical containers must be labeled (with the product name and concentration if different from original) and stored separately from medications and/or feedstuffs.

MD

- All medications used during the grow-out period to treat a disease or symptom must be noted on the flock sheet.

★ MD

- If chemicals are used, with or without a withdrawal period, in the Restricted Area during the grow-out period, they must be recorded – use record GGP 1 (pest control) or similar.

You should:

★ HR

- Buy medications, vitamins, feed additives and chemicals from reputable companies or manufacturers who have a quality control program. This should be indicated by a quality assurance mark/logo or traceability number (DIN or PC#) on the label, or through a letter of assurance from the manufacturer.

HR

- Develop a plan for how you will handle products that do not meet these conditions. Record any corrective actions you take.

b. Use of Medications During the Grow-Out Period

Medications can be administered to the flock throughout the grow-out period. However, strict adherence to laws must be observed in order to ensure the food safety of the final product.

A few drug-related definitions are listed below:

(1) Approved Medications: Approved drugs are veterinary drugs which have been evaluated by the Veterinary Drugs Directorate (VDD) of Health Canada (HC) prior to approval of a label indicating the conditions of use including the:

a. Species, e.g. chicken
b. Indications for use, e.g. to prevent coccidiosis or to treat respiratory disease
c. Route of administration, e.g. water, feed or injection
d. Maximum dosage and frequency or length of treatment
e. Precautions which may include a withdrawal time

Labels for approved drugs may not indicate a withdrawal time (some coccidiostats are not readily absorbed from the intestine). When no withdrawal time is specifically included in the HC approved label, none is required to assure food safety.
All HC approved drugs are issued a Drug Identification Number (DIN).

(2) Extra Label Drug Use (ELDU): The use of a drug product in a manner that is not consistent with what is indicated on the label, package insert or product monograph of any drug product approved by HC. For example, ELDU can include use with an alternate species (e.g. chickens versus cattle) or using an increased dosage.

(3) Off-Label Use: Use of an unapproved drug product (a drug product which does not have a DIN). Use of a drug which was never approved for use by a Canadian regulatory authority.

MD

- When purchasing, using and storing medications, all provincial and federal regulations must be followed.

HR

- Only medications approved for use by Health Canada, listed with the Veterinary Drugs Directorate for use in poultry, should be used to treat flocks during the grow-out period.
- Only in extreme situations, where no other treatments are available, should extra label or off-label medications be used.
- To confirm if a drug has been approved by Health Canada, and the specific conditions of use, check the following websites:
  - o http://www.poultryindustrycouncil.ca/ [click on “medicine labels”]
  - o http://www.inspection.gc.ca/english/anima/feebet/mib/cmibe.shtml

Extra Label and Off-Label Medication Use

The use of extra label and off-label medications in poultry must follow the protocol described in the Canadian Food Inspection Agency’s Meat Hygiene Manual of Procedures entitled “Prevention of Drug Residues from Extra Label Usage of Drugs and from Unapproved Drugs”. This protocol has been summarized in the following sections:

MD

- Extra and off-label use of veterinary drugs by farmers is restricted to the directions based on a veterinary prescription. Extra and off-label use for medicated feeds is also restricted to a veterinary prescription under the Feeds Act.
- Under no circumstances should a farmer use medications that are off or extra label without a veterinarian prescription.

If any detectable residue is found in products treated with off-label medication, or if any detectable residue is found over the maximum residue limit as determined by Health Canada in products treated with extra label medications, the product cannot be used for human consumption and will be condemned.

Since veterinarians face liability if residues are found in products treated with extra label or off-label medication, they must obtain accurate information concerning withdrawal times. This is a highly scientific process that includes taking into account

factors such as age, sex, disease status and health status of the flock and then contacting professionals at pharmaceutical companies, veterinary schools and/or the global Food Animal Residue Avoidance Database (gFARAD).

HR

- Farmers should, in consultation with the veterinarian, consider any additional methods that may be used to treat an outbreak and to prevent further outbreaks from occurring without having to use extra or off-label medications. All other options should be examined.

Recording Off and Extra Label Use on the Flock Sheet

MD

In the case of extra or off-label drug use, the withdrawal time must be recorded on the flock sheet, together with the name of the veterinarian who prescribed the drug, the date for the prescription and the source of the withdrawal period.

- If the withdrawal period was obtained from gFARAD or another source, the name and telephone number (or e-mail address) of the person who provided the information must be included on the prescription.
- If the reference is from gFARAD, veterinarians can also include the gFARAD reference number on prescriptions to indicate where the withdrawal information was obtained.

A copy of the veterinary prescription, including a withdrawal time indicating the basis for compliance with the applicable Canadian Maximum Residue Limit (MRL) or assurance of a non-detection level of residues, must be submitted with the advance copy of the flock sheet.

Processors have been instructed by CFIA not to pick up loads of live poultry unless they have received a copy of the prescription whenever the flock has been treated with the extra and off-label drugs.

Flock Information Reporting Form (Flock Sheet)

This form contains all the information you need to fulfill the requirements of the Canadian Food Inspection Agency for birds to be processed. It also gives you a chance to record the use of medications (CCP 1 & CCP 2). These are critical control points for food safety.

The flock sheet concept has been accepted and is supported by other primary production sectors and by the processing levels. Copies of the flock sheet must be sent twice to the processing plants to which your birds are shipped:

MD

a) A first partially completed copy must be sent 3-4 days prior to catching to inform the processing plant of the nature of the birds they will be receiving (including diseases/treatment and mortality rate). Individual arrangements for the transmission must be taken by each farmer and his/her processing plant.

b) A completed second copy must accompany the birds at the time of shipment.

Further information can be found in Chapter 11 c) “Flock Information Reporting Form”. A complete set of instructions for filling out the flock sheet can be found on the back of the flock sheet.

6 ANNUAL REVIEW

COMMENTS

_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

❒ Do you keep instructions for use of medications, feed additives and chemicals?
Yes _____ No _____

❒ Do you store medications in closed containers, according to manufacturer recommendations?
Yes _____ No _____

❒ Do you store chemicals separately from medications and/or feedstuffs?
Yes _____ No _____

❒ Describe your procedures for selecting medications to be used on your flock

_____
_____
_____
_____

Signature _____ Date _____ m/yr
Signature _____ Date _____ m/yr
Signature _____ Date _____ m/yr

7 The Grow-Out Period

a. Lighting

Chickens react easily to the length of the day and differences in light intensity when they are growing quickly. This is why choosing your lighting program is a critical farm management decision. There are many programs to choose from. You should consider the type and sex of the birds you are raising. Your lighting program should also co-ordinate with your feed and water systems.

During the first 3 days of the chick's. life, you should provide evenly distributed high intensity light. This will help them to start drinking and eating normally. Afterward, you should make sure they have enough illumination for normal feed and water intake and normal activity.

b. Heating and Ventilation

Your heating and ventilation systems should be able to maintain temperatures with reasonable accuracy. This will prevent overheating or chilling of the chicks. No matter what type of housing you use, you should:

- Keep brooding temperatures on Day 1 between 30° - 32°(C) 86° - 90°(F), at the eye level of the chicks.
- For the next six weeks, lower the temperature by 2° - 3°(C) 4° - 6°(F) each week until it reaches about 21°(C) 70°(F).

The optimum temperature can be different for different strains of chickens. Your best guide to their comfort is usually how the chickens are behaving.

Temperatures that are too high cause:

- crowding of the chickens away from heat source
- pasty vents
- frequent spreading and flapping of wings
- panting

Temperatures that are too low cause:

- crowding around the heat source
- huddling or piling
- feather ruffling
- rigid posture or trembling
- distress calls

When the temperature is close to optimum, you will see the chickens spread evenly over the whole brooder area or barn floor.

Always protect chickens, no matter what their age, against drafts or cold areas in the pen.

Your facilities should be designed to give you control over the air quality inside the barn during normal weather changes. This includes levels of relative humidity, dust, ammonia and carbon dioxide. A good ventilation system will bring in enough fresh air for a growing, healthy flock. You should be able to set the rate of air changes to the right level for the age and weight of the birds, given the outside weather conditions. When your system is working well and adjusted properly, you can keep the litter dry, keep temperatures uniform and prevent drafts.

HR

Although it is recognized that there are wide regional differences, where outside climate dictates, there should be a humidity gauge in each barn. The relative humidity should be kept below 70%. Humidity levels above 70% contribute to excessive moisture and ammonia levels.

You should consult with your equipment manufacturer. They can help you choose the right design, ventilation rate, number of fans, etc. for your specific operation.

c. Back-Up Systems

★ **MD**

A monitoring and alarm system must be functional to inform you of any power failure and temperature variations outside of the critical limits.

HR

Your barns should have a stand-by power system. You should test the standby system regularly to be sure that you can give your birds a proper environment if there is a power failure. In many cases, the testing frequency will be dictated by the farm insurance policy.

SOP 7 ANNUAL REVIEW

LIGHTING

❒ Describe your lighting program

_____
_____
_____
_____

HEATING AND VENTILATION

❒ Describe your heating and ventilation program

_____
_____
_____
_____

MONITORING and BACK-UP SYSTEMS

❒ Describe your monitoring and back-up system

_____
_____
_____
_____
_____

COMMENTS

_____
_____
_____
_____
_____

8 Handling Chickens During the Grow-Out Period

Sometimes, you will have to handle some of your birds for closer examination. For example, this could happen when you see the early clinical signs of a disease. Handling can be stressful to the birds, if it is not done properly.

Remember:

- Hold chickens in a 'comfortable' body position.
- Avoid holding or carrying them in a vertical position with the head down.
- Carry roasters by both legs.
- Make sure all movements with chickens are smooth.

When you release a bird in a way that forces it to fly, this can cause stress. It can also excite or even panic the other birds in the pen. Set the bird down on the floor, preferably on its feet.

a. Bird Supervision

MD You must check your chickens at least twice a day during the entire grow-out period - more often during the first week after their arrival.

Set up the pen so that you or your staff can inspect the flock easily. This is particularly important when one person is in charge of a large number of chickens.

MD You must treat sick or injured chickens promptly. If you must dispose of them, do so in a humane manner. You must cull sick or injured chickens on a daily basis.

Watch for clinical signs of disease. Look out for unusually high mortality. If you find a problem, send samples to a veterinarian or diagnostic lab. They will give you a diagnosis and treatment recommendations. Keep these reports.

★ **MD** If a reportable disease (Avian Influenza, Newcastle Disease or Fowl Typhoid) is suspected or confirmed, you must immediately inform a veterinarian from the Canadian Food Inspection Agency and your provincial board.

You should check your feed, water and ventilation systems daily. Repair defective mechanical systems at once. You should have an emergency plan for your farm. Every member of the staff should know and understand the plan.

Protect your chickens from contact with other animals. This will prevent contamination, disease and stress.

b. Dead Bird Removal and Disposal

MD

Remove dead chickens from the floor of the barn daily. Store them, or dispose of them in an approved method.

Take care when you are moving dead birds anywhere inside your Controlled Access Zone. Make sure that you keep the chance of bacterial or disease transfer to a minimum. Do not store dead birds near a water source or feed bins.

Follow the regulations in your province when you dispose of dead birds. You may be able to incinerate, compost or ship dead birds off the farm for rendering. Do not dispose of dead birds by burying them because of concerns about the danger of ground water contamination.

If birds that have been accidentally exposed to insecticides or other chemicals resulting in mortality are being sent to rendering facilities, the operators should be informed of the cause of the mortality to prevent the re-introduction of harmful residues into the food chain.

c. Medications (Critical Control Points)

MD

You must withdraw medication from feed and water before you ship your birds for processing. The withdrawal period must be according to prescription. This will give enough time for the medication to clear from the birds' systems and prevent any residues in the final product. Otherwise, provisions under 10e: "Control measures and corrective actions" must prevail.

All feed and/or water treatments must be noted on the flock sheet with the appropriate information (including date, disease, medications, withdrawal period (if applicable), length of treatment and whether or not the treatment was successful).

Feeding lines must be run empty and/or water lines must be flushed when a treatment involving a withdrawal period is used during the finishing period. Dates of these actions need to be recorded (the comments section in GPP8 can be used for this or recorded with each flock file).

d. Flock Monitoring/Bird Weighing

Birds should be weighed throughout the grow-out period. Weighing should be done either on a continuous basis (electronic in-barn scales) or manually at 28 days of age and 3-4 days prior to shipment.

SOP 8

COMMENTS

9 Loading Protocol

a. Feed Withdrawal

To ensure that the bird's gut is completely empty by the time it is processed, you will need to withdraw feed for a time of fasting.

Timing is important. Current data indicates that access to feed should optimally be cut off between 6 and 10 hours prior to evisceration. Cutting access to feed too late or too early can each cause serious problems at the processing plant. Both increase the risk that contaminated chicken products will reach the consumer.

The right feed withdrawal time depends on several factors including:

- your feeding program
- the size of the bird
- the scheduled time for catching
- how long the birds will be transported, and
- how long the birds will wait at the plant before processing

MD

You must check with your processor for instructions on feed withdrawal.

The instructions you receive may differ, depending on the management of the processor. In some instances, processors will provide you with a precise withdrawal time. Others will provide the planned processing time and your feed withdrawal contamination data from previous flocks. You will be able to reduce contaminations due to improper feed withdrawal using this data.

b. Catching

The producer or a representative should supervise the loading of all shipments.

Proper catching is humane. It is efficient and considerate of the birds' welfare. It cuts stress and injury to a minimum. It protects the quality of the product for processing and marketing.

Catching crews should:

- Change into clean clothes and footwear when they enter the Restricted Area.
- Be properly trained in the basics of animal welfare (by their employers).
- Be skilful in handling birds.

MD

During catching, birds can be killed or injured if they pile up in the corners of the barn. Producers and catchers must and can prevent this by:

- lowering the intensity of light in the pen
- corralling the birds with a net or screen to prevent suffocation
- checking corners and back walls during load-out

When loading birds into bins or crates, catchers must take care to place them so as to avoid smothering.

HR

As the loading progresses, the further the birds are carried, the greater the risk of the birds struggling and injuring themselves. To prevent suffering and to minimize subsequent bruising and fractures (wing tips and legs), crates or modules should be brought as close as possible to the birds remaining to be caught.

Do not overcrowd the birds. The number of birds per crate or bin depends on:

- the available floor space
- the body size of the bird
- the weather conditions at the time of shipping

The maximum density per crate or bin should be low enough to let all the birds rest on the floor at the same time if they were spread out evenly. They should be able to move their heads freely when sitting on the floor.

Transporters should consider weather conditions when determining load densities. In cold weather, the recommended maximum live weight loading densities for chickens in crates or bins is 63 kg/m^2 (139 lb/10 ft^2). This should be reduced in summer. When temperatures are above 32°C (90°F), birds should not be loaded unless they will be processed the same day.

During loading, you should do everything possible to protect the birds from being exposed to a sudden change in temperature. Gradually bring the temperature inside the barn towards par with the outside temperature. Guard against getting the birds wet. Protect them from sources of heat and steam.

It is best if crates with live birds are moved in a horizontal position. If you use a conveyor to load crates of live birds, set the conveyor angle to prevent excessive tilting as this causes the birds to pile up. Move all loaded crates smoothly during loading, transport and unloading.

MD

All pertinent information regarding access to feed, catching/loading and shipping must be recorded on the flock sheet.

SOP 9

Annual Record (Records to be reviewed once a year.)

LOADING PROTOCOL

❒ 1. Are roadways, loading areas & loading platforms free of obstacles?

Yes _____ **No** _____

❒ 2. If no: describe corrective measures

_____
_____
_____

❒ 3. What is the catching method?

❒ Birds chased during catching ❒ Birds not chased

❒ Flock hand loaded ❒ Flock modularly loaded

❒ 4. Is the loading procedure supervised?

Yes _____ **No** _____

Name _____

❒ 5. What do you do with birds that have been screened out and/or left behind?

_____
_____
_____
_____

10 Viewing Your Production Cycle from a HACCP-Based Perspective

a. Using HACCP on your Farm

The basic principles of HACCP will work in chicken production. However, before producers can start a HACCP program, they must be doing the basics. This is true for food processing and it is true on the farm.

- Good Production Practices (GPPs) must be in place.
- These GPPs must be monitored to make sure people are following them.
- Producers must be able to show that they take effective action to correct a problem whenever there is a hazard or a deviation from a GPP.

Once producers meet these conditions, they are ready for HACCP. There are three steps in the HACCP process.

1. The first step is to fully understand the hazards that could be present. There are three different types of food safety hazards - biological, chemical and physical.

   Biological Hazards

   In general, the main biological hazards found in livestock operations come from human pathogens. E. Coli, Campylobacter jejuni and Salmonella are examples. There are good ways to control biological hazards in food processing. However, we know much less about how to control them at the farm level.

   Chemical Hazards

   Chemical hazards in chicken production could come from a number of sources. For example, chickens could have unacceptable levels of an antibiotic or vaccine, or mycotoxin from mouldy feed. Bedding materials might have been made from raw materials with excessive levels of pesticides or herbicides.

   Physical Hazards

   Physical hazards are more often found in food processing plants where foreign materials such as metal, plastic or glass can get into the finished products. Although there may be some physical hazards in livestock operations, physical hazards are unlikely to occur in live chickens going to the processing plant.

2. The second step is to find ways to minimize or eliminate each hazard. Some can and must be controlled before the chicks come to the farm. You can also control some during the grow-out period. A few cannot be controlled on the farm. This could happen because we do not know enough about how the hazards might affect food safety. Or it could be because there are no actions that you could take, given our present knowledge, to prevent the hazard at the farm level.

3. The third step is to plan the specific actions that you will take to correct or control the hazards if you find them.

b. The Seven HACCP Principles

The World Health Organization (WHO) has set out seven principles to follow when developing a HACCP plan. These are:

1. Identify the biological, chemical and physical hazards for each raw material and production step.

2. Apply the HACCP Decision Tree to find which of these are Critical Control Points (CCPs). The Decision Tree is described later in more detail.

3. Set critical limits to ensure that each of the CCPs is under control.

4. Set up monitoring procedures for each CCP.

5. State what corrective actions will be followed whenever a problem is found.

6. Set out verification procedures to prove that the control program is working.

7. Set up records and documentation to prove that you are actually doing what you say you will do.

c. The HACCP Decision Tree

Producers can control many food safety hazards effectively by having and following Good Production Practices. Some, however, need detailed monitoring and control. These are called Critical Control Points (CCPs).

One of the hardest steps in looking at your operations from a HACCP perspective is choosing your Critical Control Points. A CCP can be either a raw material or a production step. Fortunately there is international agreement on the approach to take. This is called the HACCP Decision Tree.

Here is how it works:

Once you have identified a potential hazard, decide if you can control it fully by following your Good Production Practices. If you can, say so. Describe how your Good Production Practices control the hazard. Specify how and what corrective action(s) you will take.

If you cannot control the hazard by following your Good Production Practices, you must start to use the Decision Tree.

The Decision Tree is made up of four questions. It asks:

- Can a control measure be used at any production step in production?
- How likely is it that the hazard will be present above an acceptable level?
- Is there a control measure that will eliminate or minimize the hazard?
- Are there any steps that can be taken later in the process to eliminate the hazard or reduce its probable occurrence to an acceptable level?

The answers to these questions tell you whether a raw material or production step is a Critical Control Point.

The food safety assurance design team identified two Critical Control Points related to the avoidance of chemical residues:

- Receiving contaminated feed where there is the risk that it will be fed to the chickens, and
- Treatment with medications, through feed or water, where improper control may lead to residues that are too high.

For each of these CCPs, the food safety team identified appropriate control measures and corrective actions.

d. What About Pathogens?

As the food safety team worked on this program and the CCPs, they realized that one specific potential hazard needed special consideration. The hazard? It is the risk that some incoming materials may contain pathogens or that pathogens may be introduced to the chickens in two steps of production.

The incoming materials that could be contaminated include day-old chicks, feed, water, antibiotics and bedding. The two production steps of receiving and storing feed and ineffective disinfecting could both create the chance for contamination.

In either case, there is little scientific evidence to confirm that contamination leads to a higher risk to food safety. More importantly, there does not appear to be any control measure that growers can take to fully address the hazard, i.e., to eliminate all pathogens. Clearly, more research is needed. Once we can identify an effective control measure, it will be incorporated into *Safe, Safer, Safest.*

e. Control Measures and Corrective Actions

Monitoring, Deviation and Verification procedures are the heart of an on-farm, food safety assurance system based on HACCP principles. These do not have to be complicated. They are easy activities - and a way of thinking - that need to become a habit. Below are some ideas about what these activities might be.

The following describes what measures should be taken to reduce the potential for a food safety hazard for each of the CCP's in this program:

1) Feed Receiving

MD

Monitoring Procedures:

- Check bins for proper identification (yearly basis).
- Keep a record of the bin into which each feed delivery is unloaded (yearly basis).
- The driver must leave a feed slip at the time of unloading.
- Keep a record of the medication, date and time for every load.
- Inspect the feed for mould, etc.
- Take feed samples as described in Chapter 2. Store the samples for future analysis, if necessary.

MD

Deviation Procedures

If corrective actions are needed, these could include:

- Removing the feed from the feeders. Record the date and time of removal.
- Contacting the catching crew and/or processor to reschedule their activities. Record the contact.
- Rededicating the feed to an appropriate barn. Discuss the deviation with the supplier.

Verification Procedures

You must review your food safety assurance program every time a procedure or an operation has been changed. If it becomes necessary, you should revise your procedures. If you have found a problem, you may wish to send the stored sample for analysis.

2) Treatment with Medication

Monitoring Procedures

MD

- Make sure that the correct medication is being used at the proper time during grow-out.
- Keep a record of the medication(s) you use, when the treatment began and when it stopped.
- Make sure the water is being metered properly, according to the equipment specifications. Water medicators must be tested before each usage. Record this.
- Feed lines must be run empty and/or water lines must be flushed when a medication involving a withdrawal period is used during the finishing period.

MD

Deviation Procedures

For medicated feed:

- Follow the same procedures as those described for feed receiving.
- Remove the feed from the feeders. Record the date and time of removal.
- Contact the catching crew and/or processor to reschedule their activities. Record the contact.
- Rededicate the feed to an appropriate barn. Discuss the deviation with the supplier.
- In addition, for medication that is delivered through water.
    - o Stop the use of medication in the water. Record the date and time of the change.

11 Record Keeping - Filling Out the Forms

The record-keeping forms are designed to help you prove that you have control of your operations. The information on these forms will be required during your on-farm audit – they will play a major role in demonstrating that you have properly implemented the good production practices and critical control points of this program.

Record keeping is the key to a strong HACCP-based program. Records allow for farmers to prove that they are doing what they say they do. The record-keeping forms are designed to:

a) prove that you have control of your operations

b) provide a record of what you have done

c) provide reminders to farmers of what needs to be done and to ensure that farm food safety production practices are followed

Record keeping forms have been provided with this manual; however, if you already have your own record system or an individual quality and food safety control program with forms meeting the objectives of this program, you do not have to change from the forms you are currently using. You will, however, want to ensure that the information on your forms meets the level of information required by this manual.

Types of Records

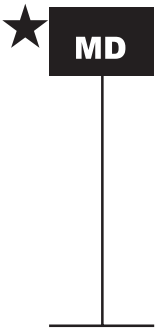
★ MD

(1) Standard Operating Procedures

- At the end of each chapter, there is an SOP (Standard Operating Procedure) Form which allows you to describe the procedures you would normally use on your farm. These forms must be completed in order to demonstrate what practices are used on your farm on an ongoing basis.
- These forms must be completed prior to initial implementation on the farm. They must also be reviewed annually or updated as necessary.

(2) Individual Flock Records (to be completed during each cycle)

- These records contain information that is pertinent to each cycle. The purpose of these records is to demonstrate what procedures were used during each individual grow-out.
- A full set of these records must be completed for each flock you raise. Some of these records also require that you keep bills of lading from the feed or from the chick supplier.
- These records are found in the “Forms” section of this manual. Two different forms have been provided (described in the next section) - either



set of forms, or a variation thereof, can be used to record the individual flock information.

- Other formats have also been developed to record this individual flock information. Some may be provided to you by your provincial board or through suppliers. Just remember to check that all the information required by this program is included on the record forms that you are using.
- Farmers will be required to retain at least one years' worth of records at all times.

How to Fill Out the Record Forms

(A) Standard Operating Procedures (SOP 1, 2, 3, 4, 5, 6, 7, 8, 9)

- The Standard Operation Procedure forms in the manual ask specific questions as to the procedures used on your farm – answer each question by placing a check in the box beside each question if it pertains to your farm, by providing a longer answer where required and by using an "N/A" or a stroke for any question that does not relate to your operation.
- If the information being requested can already be found elsewhere, simply indicate where the information can be found – and be sure that it is available during the on-farm audit.
- Where required sign and date these forms each time a change has been made.
- These forms must be reviewed annually or as required.

(B) Individual Flock Records

As previously indicated, two different types of forms have been provided with this manual – *only one type of form needs to be completed per flock.*

Type 1: GPP and CCP Records for each chapter of the manual (8 pages total)
Type 2: Combined Records for all of the manual requirements (3-5 pages total)

Here are some general guidelines for filling out the forms specific to each flock:

- When you complete an activity, check the box beside it on the form.
- Write in the date you finished on the line provided.
- Record the name of the chemical, feed additive or medication that you used.
- For any space that does not apply to your operations, indicate this with a stroke or write "N/A".

The two types of records are described below in further detail:

Type 1: GPP and CCP Records for each chapter (8 pages total)

GPP 1: *Farm Access & Pest Control Programs (See Chapter 1 - Controlling Access to the Farm)*

- Identify whether or not a log book is maintained for all visitors and whether the area around the barn has been properly maintained.
- Identify the control measures used on your farm for pests and rodents – be sure to include the type of products used.

GPP 2: *Facility Preparation (See Chapter 2 - Access to Feed and Water and Chapter 4 – Bedding Materials); Water and Watering System (See Chapter 2 (d) – Potable Water and Watering Systems); Feeding System (See Chapter 2 (c) Feed & Feeding Systems)*

- The activities for this GPP are performed on a daily basis, as well as before the chicks are placed.
- Indicate with a check if the facilities preparation activities are completed prior to placement.
- Indicate what type of watering system is used and the sanitation program being used in the present cycle.
- Indicate if the feed was checked daily throughout the cycle.

GPP 3: *Cleaning and Disinfecting (See Chapter 3 - Cleaning and Disinfecting)*

- Fill out this form based on the guidelines noted at the beginning of this section.
- For each item, record the date and type of product used as indicated on the form.

GPP 5: *Chicks (See Chapter 5 - Chicks)*

Checking the condition of the chicks when they arrive and again three to four days into the grow-out period will get you ready for any problems that could arise.

- Record this activity on form GPP 5.
- Ensure documentation is complete from the hatchery and record this on GPP 5.

GPP 8: *Culling and Mortality Disposal (See Chapter 8b – Dead Bird Removal and Disposal)*

- Record your culling and mortality disposal on a daily basis and summarize the results on this checklist. End results should be transferred to the flock sheet. Indicate how mortality was disposed of during this grow-out period.

GPP 9: *Loading Protocol (See Chapter 9 - Loading Protocol)*

- You will find the things you should consider for load-out on this GPP 9. Record your actions with checks or a description.
- Other elements including feed and water withdrawal, catching and loading will have to be recorded on the flock sheet.

CCP -1: *Water Quality Control (See Chapter 2d – Potable Water and Watering Systems)*

Water is critically important to your operations. First, it is essential for a healthy flock. Second, it can also serve as one way to administer medications to your birds.

Form CCP-1 allows you to demonstrate that you are paying constant attention to the quality of the water. This is especially important if there is any risk of contamination with chemicals, molds, etc.

- If you have performed the action at the head of each column, place a check mark in the box beside “record” at the end of the week. If you had to take any corrective action, please record it in the box as well.
- For treated water, record the type of chemical used and the concentration.
- Each time the accuracy of the medicator is verified, record the date, the method used, and the results.

CCP -2A: *Feed Sampling at Time of Delivery (See Chapter 2c – Feed and Feeding Systems)*

- Record a checkmark each time a sample is taken from a load of delivered feed. Ensure that you have read the bill of lading to determine what type of medications (if any) have been included in the feed. If you have had to implement a corrective action, record the action in this space.
- Record a checkmark under the columns of visually checking for fines/pellets after each load, for checking daily for moldy feed and for checking daily that there is sufficient feed in the feeders and hoppers.
- Under the “Summary for Feed”, ensure that these activities are performed after each load, and record a checkmark to demonstrate that you have performed the activities.

CCP -2B: In-Barn Feed Sampling During the Last Two weeks of Grow-Out (See Chapter 2c – Feed and Feeding Systems)

- On this record form, place a checkmark each time that a sample is collected from inside the barn. This form needs only to be filled out if you are required to sample from inside the barn.
- If you have had to implement a corrective action, record the action in this space.

Type 2: Combined Records for all of the manual requirements (3-5 pages total)

- Requirements before Flock Placement (Page 1)
  - Record the date for each activity. A description of the activity, chemical product and/or concentration is required where a "*" is indicated.
- Requirements during Grow-Out (Page 2)
  - The information on the top of the record (Quota period etc., Hatchery Documentation, transportation and Quality Assessment) should be completed.
  - The dates and day of age can be customized to your operation. Each day that an activity occurs, a checkmark should be placed in that box. The highlighted boxes (bolded) indicate the frequency that an activity must occur; however, the actual dates may vary slightly in your operation.
- Requirements during Grow-Out (Page 3-5)
  - The same type of information is required on this page as the previous page, until the end of the grow-out.
  - At the bottom of the record form, fill in the information on the day of catch as it relates to your operation.
  - Depending on the length of your grow-out, additional pages have been added to allow for grow-out periods.

(C) Flock Information Reporting Form (Flock Sheet)

MD

- The instructions on how to use the flock sheet can be found on the reverse side of the flock sheet. These instructions must be followed.
- A few important instructions are listed below:
  - List the name of all vaccines and medications administered at the hatchery (as per hatchery invoice) in Section A. Include all vaccines administered at the farm level in Section A as well.

MD

- In Section B, list all diseases or syndromes that were diagnosed, including those for which no medications were administered.
- Also in Section B, list all medications given to the flock throughout the entire grow-out that were administered as a result of a disease or a syndrome.
- For preventive medications provided in the feed, only those with a withdrawal period given to the flock in the last 14 days need to be listed in Section C.

Quota Period Date

GPP 1 FARM ACCESS AND PEST CONTROL

❒ 1. Log book maintained for farm visitors

❒ 2. Grass cut and debris around building removed
- ❒ Equipment, manure storage and debris kept away from growing facility

❒ 3. RODENTS: Control measures used
Name baits & poison used_____
Number of bait stations_____ Number of traps used _____

❒ 4. WILD BIRDS: Control measures used
_____
_____
_____
_____

❒ 5. FLIES: Control measures used
Name insecticides/baits used_____
Fly strips used_____

❒ 6. DARKLING BEETLES: Control measures used
Name insecticides used_____
Date _____

❒ 7. OTHER PESTS: Control measures used
Name(s) of other pests_____
Name(s) of products used to control these pests
_____
Date(s) _____

❒ 8. No pets allowed in the barn
Signature:_____
Date:_____

Quota Period Date

FACILITIES PREPARATION

GPP 2

- ❒ 1. Building State of repair
  Comments_____
  _____
  _____
- ❒ 2. Heating system checked
- ❒ 3. Stand-by generator checked
- ❒ 4 Ventilation system checked
- ❒ 5. Light system checked
- ❒ 6. Drinkers & feeders checked individually before placement
- ❒ 7. Bedding material
  Type_____
  Date_____
  ❒ Checked for mold/ feathers/droppings
- ❒ 8. Temperature on day of placement
  __ ºF/ºC at 2 ft above floor level
  OR
  __ ºF/ºC at 6" above floor level

WATER AND WATERING SYSTEM

- ❒ 1. Bell waterers/troughs cleaned _____Times/Week
- ❒ 2. Checked nipple system daily
- ❒ 3. Changed/cleaned water filter Date (s) _____
- ❒ 4. Precision of water treatment system verified (annually) Date: _____
  Results: _____

FEEDING SYSTEM

- ❒ 1. Feeding system checked daily
- ❒ 2. Residual fines eliminated when necessary prior to shipping

Record of Feed Transfers

Date Moved	Type of Feed	Original Location	Transferred To	Medication with withdrawal period used in the flock (list withdrawal times)	Method of Transport	Sample Taken	Management Protocol of the original feed bin (use back of page)

Quota Period Date

CLEANING AND DISINFECTION

GPP 3

❒ 1. Remove dust

❒ 2. Empty Feeders

❒ 3. Remove litter and manure and store at safe distance & in safe method
Date _____

❒ 4. Clean the barn/equipment
Date_____

❒ 5. Empty, clean and inspect boot of feed tank/silo and feeding system
Date_____

❒ 6. Inspect inside and outside of feed tank/silo (minimum once a year)
Date_____
Remarks_____

❒ 7. Flush and clean/disinfect water line
Name_____
Date _____

❒ 8. Needed repairs done
Date _____

❒ 9. Thoroughly washed barn/equipment at least once a year

Name of washing agent
_____
Date_____

❒ 10. Barn disinfected

Name_____
Date_____

❒ 11. Apply insecticide

Name_____
Date _____

❒ 12. Apply fumigant
Name_____
Date _____

❒ 13. Visually inspected
Date_____

❒ 14. Building ready
Date_____

❒ 15. Clean and disinfect equipment used during cleanout

Name_____
Date _____

Quota Period Date

GPP 5

The following information could be verified and checked directly on the invoice to avoid an additional piece of paper. In provinces where chicken farmers must fill a chick placement report and in conjunction with data checked on the invoice, there might not be a need for this form.

CHICKS

❒ Documentation completeness

- ❒ Vaccination & dosage
- ❒ Treatment & withdrawal period (if applicable)
- ❒ Age group
- ❒ Lot identification (origin coding system)
- ❒ Hatching date

❒ Were chicks hatched (pulled out of the hatchery) & transported for more than 12 hours.

Yes _____ No _____

If yes: describe special measures taken (if any)

_____
_____
_____
_____

QUALITY ASSESSMENT

	Upon receipt		3-4 days in grow-out period	
	Acceptable	**Not acceptable**	**Acceptable**	**Not acceptable**
Alertness				
Vigour				
Condition				
Normality				

Quota Period Date

GPP 8 GPP CULLING & MORTALITY DISPOSAL

❒ 1. Collected & disposed of mortality daily.

❒ 2. Method of disposal

❒ Away from farm ❒ Composting on farm

❒ Incineration on farm ❒ Other: _____

❒ 3. Recorded mortality & culls on mortality sheet

❒ 4. Flock Summary

Flips: No. ____ ; ____ % Legs: No. ____ ; ____ %

Culls: No. ____ ; ____ % Other: No. ____ ; ____ %

Total mortality and culls: No. ____ & ____ %

GPP 9 LOADING PROTOCOL

❒ 1. Roadways, loading areas & loading platforms free of obstacles on pickup day.

❒ 2. Barn temperature reduced (_____ hrs) prior to scheduled loading:

Outside temperature _____ °C/°F Inside temperature_____ °C/°F (just prior to loading)

❒ 3. Weather conditions during loading _____

❒ 4. Was the loading supervised? Name: _____

Comment on how loading was performed

_____

_____

_____

_____

Quota Period Date

CCP 1 Water Quality Control

Week	❒ Water treated Chemical Name: Concentration:	Slime/mold Zero Tolerance Yes/No	Turbidity or Cloudiness Yes/No	All waters & nipples filled Yes/No	Read Water meter Yes/No/NA [2]	Waterers height adjusted	Water Medicator Tested
	Checked Weekly	Checked daily	Checked weekly	Checked daily	Read daily	Done daily (or as necessary)	Each time a medication is used
1 Record CA[1]							
2 Record CA							
3 Record CA							
4 Record CA							
5 Record CA							
6 Record CA							
7 Record CA							
8 Record CA							
9 Record CA							
10 Record CA							

[1]CA: Corrective Action
[2]NA: Not Applicable

Quota Period | Date

CCP 2A FEED SAMPLING AT TIME OF DELIVERY

		Feed: 1 Sample/ Load Kept, Checked bill for medications	Feed Visually Checked For Fines/Pellets (size)	Mouldy (caked & lumpy Feed)	Sufficient Feed in Feeders and Bins
		Every Load	**Every Load**	**Checked daily**	**Checked daily**
LOAD #1	**DATE: RECORD CA[1]**				
LOAD #2	**DATE: RECORD CA**				
LOAD #3	**DATE: RECORD CA**				
LOAD #4	**DATE: RECORD CA**				
LOAD #5	**DATE: RECORD CA**				
LOAD #6	**DATE: RECORD CA**				
LOAD #7	**DATE: RECORD CA**				
LOAD #8	**DATE: RECORD CA**				
LOAD #9	**DATE: RECORD CA**				

SUMMARY FOR FEED

- ❒ 1. Driver left copy of bill of lading, feed description
- ❒ 2. Representative feed samples taken as per Feed Sampling method described in Chapter 2
- ❒ 3. Visually checked feed for mould, caking
- ❒ 4. Kept record of medications
- ❒ 5. Kept feed samples for at least 14 days after shipping to the processor

1 CA: Corrective Action

Quota Period | Date

CCP 2B IN-BARN FEED SAMPLING DURING THE LAST TWO WEEKS OF GROW-OUT

	Sample Collected out of hopper	Corrective Action
14 days before processing		
12 days before processing		
10 days before processing		
8 days before processing		
6 days before processing		
4 days before processing		
2 days before processing		