Responsible Antibiotic Use: Chicken Farmers of Canada's Strategy

Swine Innovation Porc Health Session

January 8, 2019

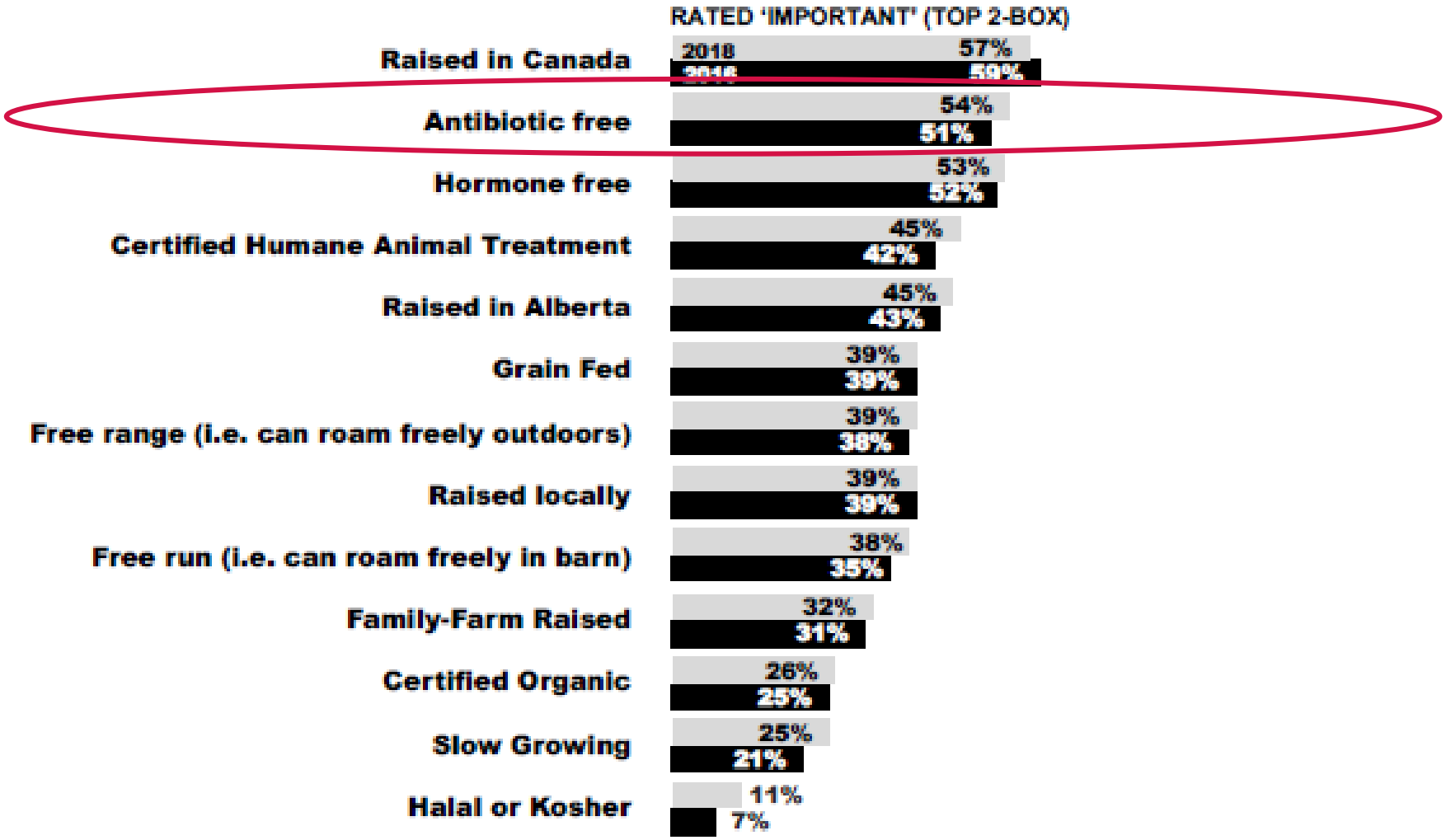
Swine Innovation Porc

Chicken Farmers of Canada
Les Producteurs de poulet du Canada

Agriculture and Agri-Food Canada
Agriculture et Agroalimentaire Canada

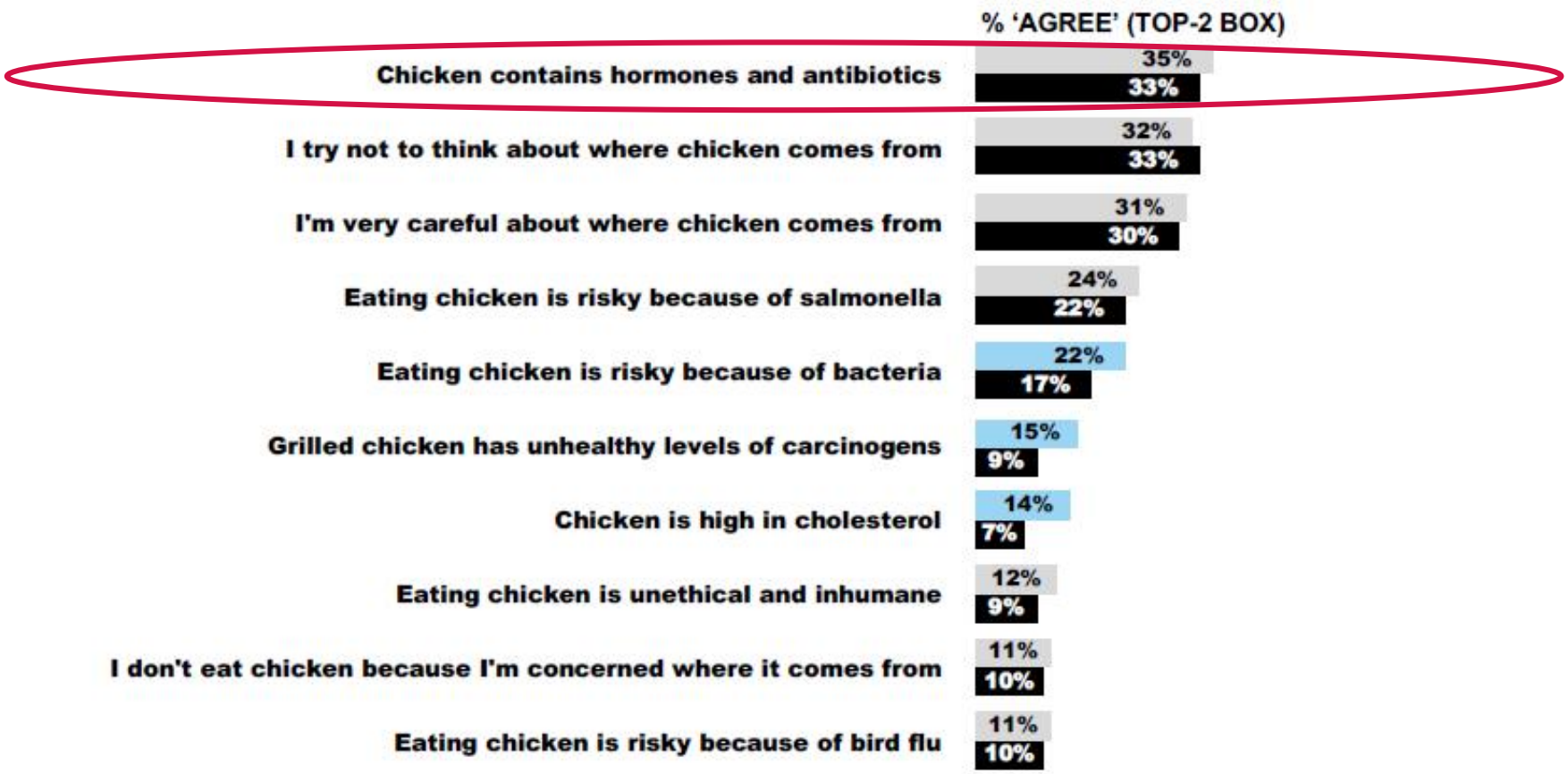
Alberta Pork · BC Pork · Les Éleveurs de porcs du Québec · Manitoba Pork · Ontario Pork · PEI Pork · Porc NB Pork · Sask Pork

CHICKEN CLAIM APPEAL



QC6. When purchasing CHICKEN from a GROCERY STORE, how IMPORTANT are the following CLAIMS to you personally?

NEGATIVE PRODUCT PERCEPTIONS

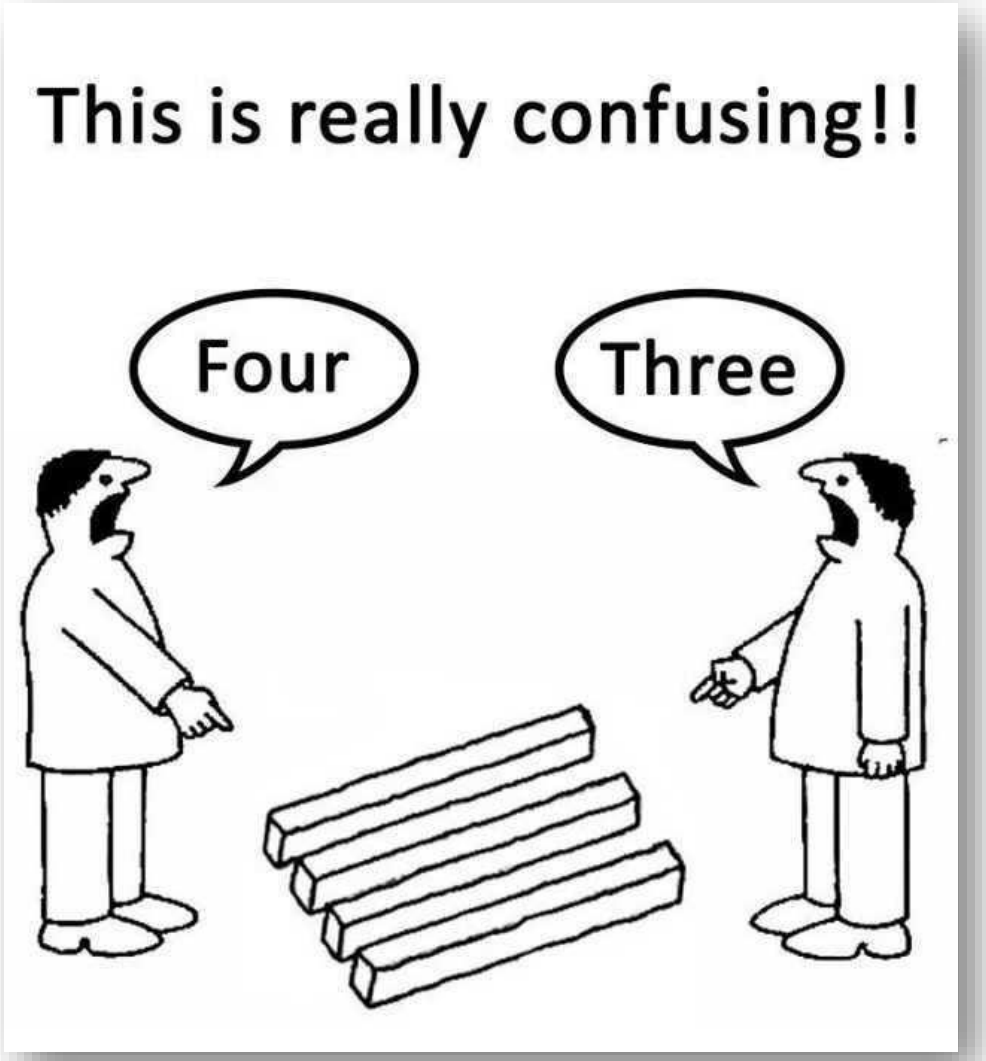


5% ABOVE 2016

5% BELOW 2016

QE1. Thinking about your CHICKEN CONSUMPTION, please indicate how strongly you AGREE or DISAGREE with the following statements. There are no right or wrong answers.

Where do these perceptions come from?



BROAD SOCIAL ACCEPTANCE

MEDIA AND PERSONAL COMMUNICATION HAVE BOTH CONTRIBUTED TO HORMONE & ANTIBIOTIC PERCEPTIONS

"You see the commercials on TV for A&W about their beef without hormones... but I don't know anything. I just know that they're present and lots of people think they're bad."
– FEMALE 18-39

"I think first it was brought up to me just talking to friends and things. And then I did a bit of research... I'm by no means an expert on the topic. It kind of just started by talking to people about it." – FEMALE 18-39

CFC's Antimicrobial Use Strategy

Outline

- **CFC AMU Strategy**
  - Drivers
  - Development
  - Elements
  - Implementation
- **Integration with the Pan-Canadian Framework on Antimicrobial Resistance and Use**
  - Veterinary oversight
- **Public communication**
  - Retail, restaurant and consumers
- **Hurdles & Actions to Address Challenges**

Chicken Farmers of Canada

- **Represents Canada's 2,800 chicken farmers**

- **CFC is comprised of a 14-member board**
  - 10 farmers
  - 2 processors
  - 1 further processor
  - 1 restaurant representative

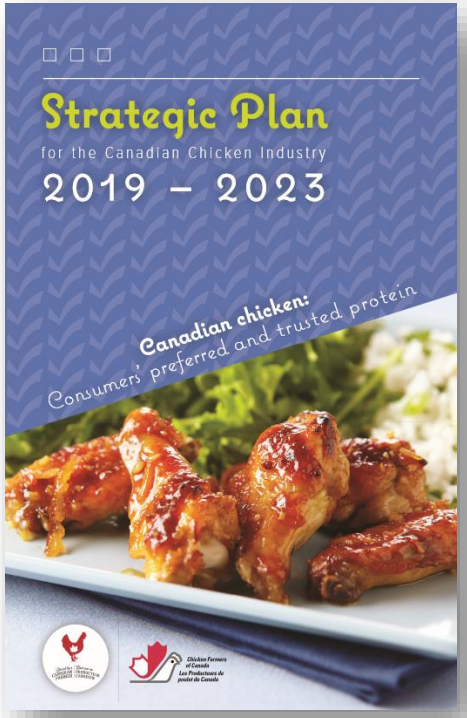
- **CFC develops strategic direction and policy on production issues**
  - Food safety, animal care, antimicrobial use

Drivers

- **Retailers and Restaurants**
  - Movement towards "*Raised without the use of antibiotics*" products
    - US and Canada
  - Investment groups mandating restaurants to curb the use of antibiotics in meat and poultry production
- **Surveillance results (AMR and AMU)**
  - Highlighted key issues in the chicken sector
  - To answer the public health threat on AMR
- **Processors**
  - Seeking the elimination of preventive use of medically-important antimicrobials
- **To maintain consumer confidence**

Development: CFC is committed to AMU and AMR

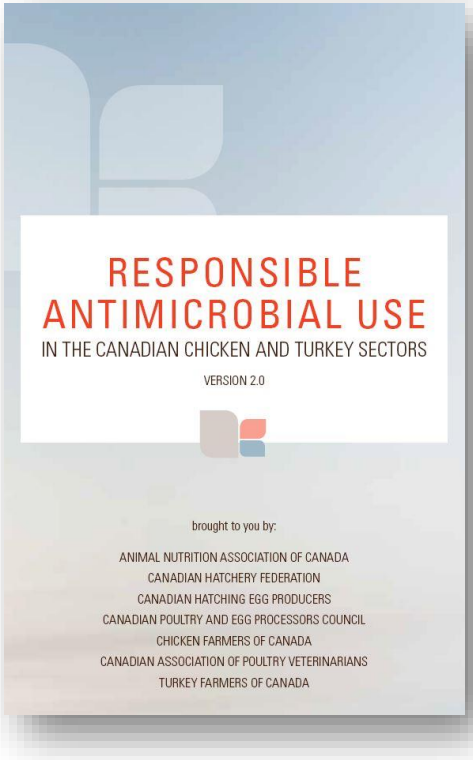
- **Antimicrobial Use (AMU) and Antimicrobial Resistance (AMR) are key priorities**
  - CFC strategic plan (2014-2018)
    - Implement an antibiotic reduction strategy
    - Decrease the use of antibiotics of human importance
  - CFC strategic plan (2019-2023)
    - Implement CFC's antibiotic reduction strategy
    - Eliminate preventive use of Category II antibiotics by the end of 2018
    - Work toward eliminating preventive use of Category III antibiotics by the end of 2020
    - Collaborate with value-chain to modify management practices



AMU Strategy Development - 2012

- **Included all value-chain stakeholders**

- **Key elements:**
  - Surveillance
  - Research
  - Reduction
  - Education



- **Objective:**
  - *To proactively manage antimicrobial use to preserve effective treatment options and to provide continued confidence to government and consumers*

Reduction Strategy

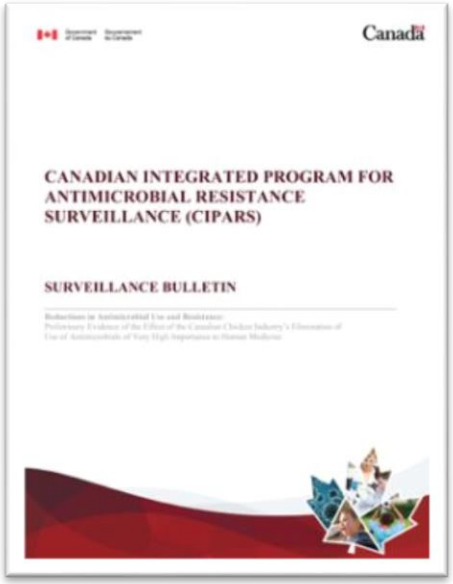
- **Not a *"Raised without the use of antibiotics"* strategy**
- **CFC's focus is on the preventive use of antibiotics of human importance**
  - Categories I, II and III
- **Key objectives:**
  - To eliminate the preventative use of antibiotics of importance to humans
  - To maintain the use of antibiotics for treatment
  - To maintain the use of ionophores (Category IV) and coccidiostats for prevention
  - To sustainably meet customer expectations while protecting animal health

Reduction Strategy

Reduction → Surveillance → Stewardship → Research & Innovation

Surveillance

- **Since 2013, CFC has collaborated with the Public Health Agency of Canada on surveillance at the farm level**
  - For both antibiotic use and resistance
- **Important to understand use patterns for policy development**
- **Important to understand the impact of our policies**
  - ***CIPARS demonstrates compliance and effectiveness of the Category I ban***



Research

- **Research funded through the Canadian Poultry Research Council and provincial research agencies**
  - Reduction of antimicrobial use has been made a priority
- **Research areas:**
  - Evaluation of management practices throughout the supply chain (e.g. broiler breeders, hatcheries, broiler farms)
  - Alternative products (e.g. feed additives, water acidification)
  - Vaccines (e.g. Necrotic enteritis)
  - Gut health
  - Impact of eliminating preventive use

Reduction: AMU Reduction Committee

- **CFC committee assembled to examine the possibilities of AMU reduction**
  - Members included farmers, feed mills, veterinarians, hatcheries, processors, and academia
  - CFC performed a consultation with industry stakeholders on the feasibility and practicality of the committee's recommendations
    - Final report tabled with CFC Directors

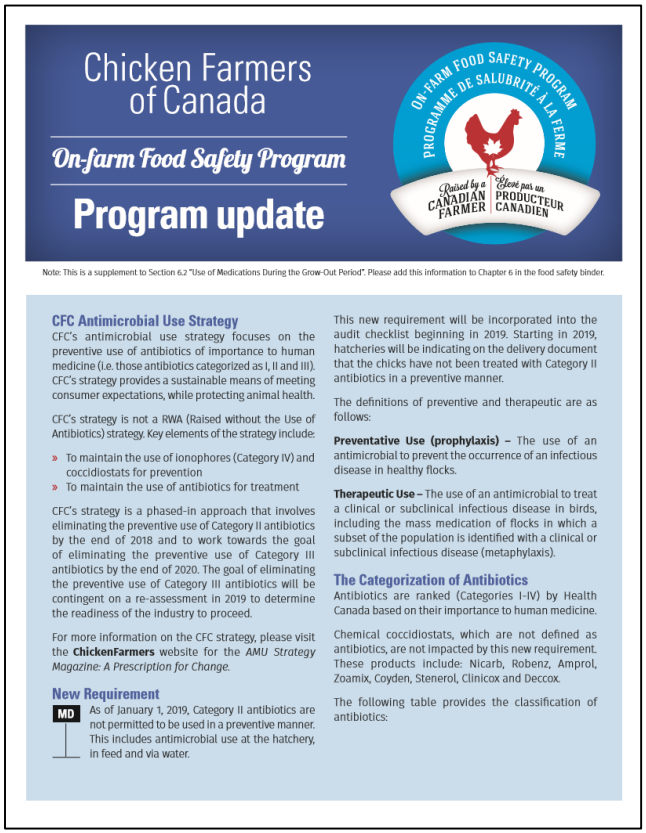
Phased Approach to AMU Reduction

- **Phase 1 – Elimination of the preventive use of Category I antibiotics**
  - May 15, 2014
- **Phase 2 – Elimination of the preventive use of Category II antibiotics**
  - End of 2018
- **Phase 3 – Goal to eliminate the preventive use of Category III antibiotics**
  - End of 2020
  - A re-assessment of this goal will occur in 2019

Implementation and Enforcement

CFC's *Raised by a Canadian Farmer* On-Farm Food Safety Program

– Mandatory for 100% of farmers, with provincial enforcement



Chicken Farmers of Canada

On-farm Food Safety Program

Program update

Note: This is a supplement to Section 6.2 "Use of Medications During the Grow-Out Period". Please add this information to Chapter 6 in the food safety binder.

CFC Antimicrobial Use Strategy

CFC's antimicrobial use strategy focuses on the preventive use of antibiotics of importance to human medicine (i.e. those antibiotics categorized as I, II and III). CFC's strategy provides a sustainable means of meeting consumer expectations, while protecting animal health.

CFC's strategy is not a RWA (Raised without the Use of Antibiotics) strategy. Key elements of the strategy include:

- To maintain the use of ionophores (Category IV) and coccidiostats for prevention
- To maintain the use of antibiotics for treatment

CFC's strategy is a phased-in approach that involves eliminating the preventive use of Category II antibiotics by the end of 2018 and to work towards the goal of eliminating the preventive use of Category III antibiotics by the end of 2020. The goal of eliminating the preventive use of Category III antibiotics will be contingent on a re-assessment in 2019 to determine the readiness of the industry to proceed.

For more information on the CFC strategy, please visit the **ChickenFarmers** website for the *AMU Strategy Magazine: A Prescription for Change.*

New Requirement

MD

As of January 1, 2019, Category II antibiotics are not permitted to be used in a preventive manner. This includes antimicrobial use at the hatchery, in feed and via water.

This new requirement will be incorporated into the audit checklist beginning in 2019. Starting in 2019, hatcheries will be indicating on the delivery document that the chicks have not been treated with Category II antibiotics in a preventive manner.

The definitions of preventive and therapeutic are as follows:

Preventative Use (prophylaxis) – The use of an antimicrobial to prevent the occurrence of an infectious disease in healthy flocks.

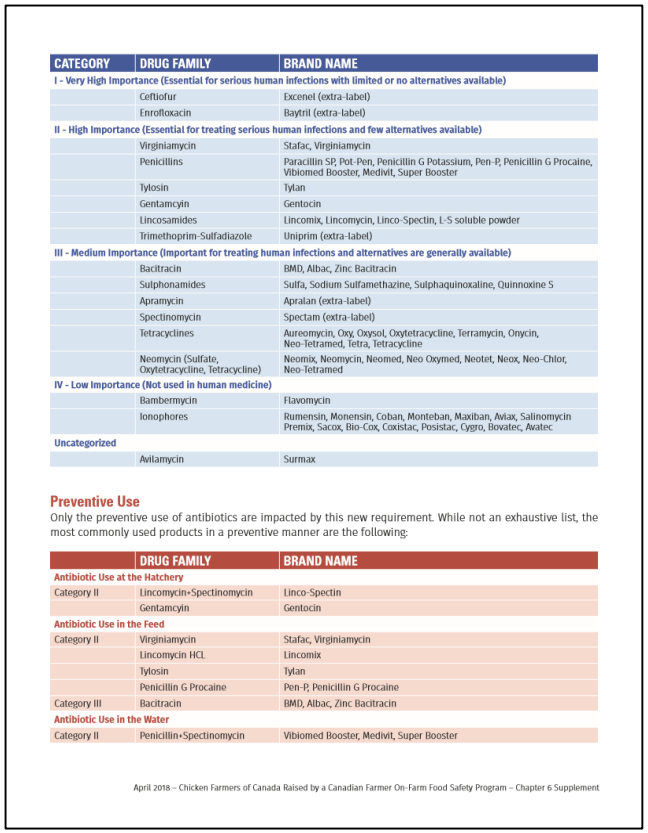
Therapeutic Use – The use of an antimicrobial to treat a clinical or subclinical infectious disease in birds, including the mass medication of flocks in which a subset of the population is identified with a clinical or subclinical infectious disease (metaphylaxis).

The Categorization of Antibiotics

Antibiotics are ranked (Categories I-IV) by Health Canada based on their importance to human medicine.

Chemical coccidiostats, which are not defined as antibiotics, are not impacted by this new requirement. These products include: Nicarb, Robenz, Amprol, Zoamix, Coyden, Stenerol, Clinicox and Deccox.

The following table provides the classification of antibiotics:



CATEGORY	DRUG FAMILY	BRAND NAME
I - Very High Importance (Essential for serious human infections with limited or no alternatives available)		
	Ceftiofur	Excenel (extra-label)
	Enrofloxacin	Baytril (extra-label)
II - High Importance (Essential for treating serious human infections and few alternatives available)		
	Virginiamycin	Stafac, Virginiamycin
	Penicillins	Paracillin SP, Pot-Pen, Penicillin G Potassium, Pen-P, Penicillin G Procaine, Vibiomed Booster, Medivit, Super Booster
	Tylosin	Tylan
	Gentamcyin	Gentocin
	Lincosamides	Lincomix, Lincomycin, Linco-Spectin, L-S soluble powder
	Trimethoprim-Sulfadiazole	Uniprim (extra-label)
III - Medium Importance (Important for treating human infections and alternatives are generally available)		
	Bacitracin	BMD, Albac, Zinc Bacitracin
	Sulphonamides	Sulfa, Sodium Sulfamethazine, Sulphaquinoxaline, Quinnoxine S
	Apramycin	Apralan (extra-label)
	Spectinomycin	Spectam (extra-label)
	Tetracyclines	Aureomycin, Oxy, Oxysol, Oxytetracycline, Terramycin, Onycin, Neo-Tetramed, Tetra, Tetracycline
	Neomycin (Sulfate, Oxytetracycline, Tetracycline)	Neomix, Neomycin, Neomed, Neo Oxymed, Neotet, Neox, Neo-Chlor, Neo-Tetramed
IV - Low Importance (Not used in human medicine)		
	Bambermycin	Flavomycin
	Ionophores	Rumensin, Monensin, Coban, Monteban, Maxiban, Aviax, Salinomycin Premix, Sacox, Bio-Cox, Coxistac, Posistac, Cygro, Bovatec, Avatec
Uncategorized		
	Avilamycin	Surmax

Preventive Use

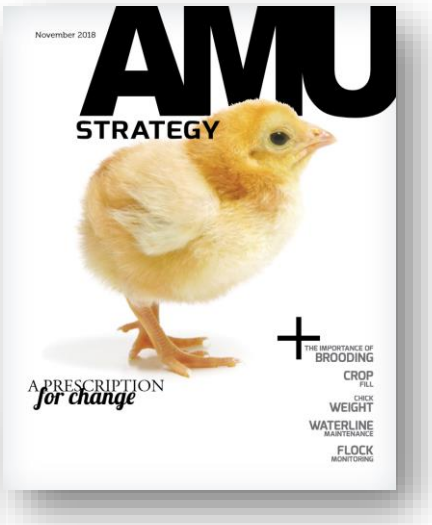
Only the preventive use of antibiotics are impacted by this new requirement. While not an exhaustive list, the most commonly used products in a preventive manner are the following:

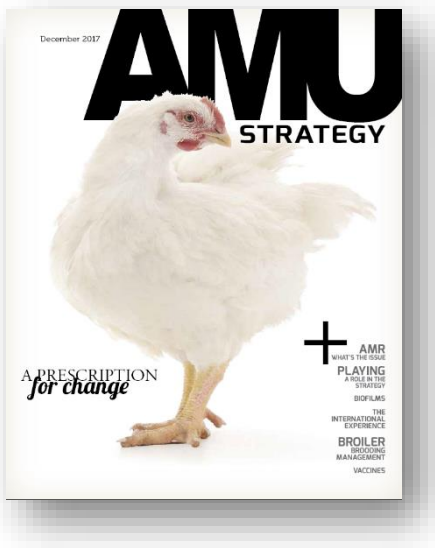
	DRUG FAMILY	BRAND NAME
Antibiotic Use at the Hatchery		
Category II	Lincomycin+Spectinomycin	Linco-Spectin
	Gentamcyin	Gentocin
Antibiotic Use in the Feed		
Category II	Virginiamycin	Stafac, Virginiamycin
	Lincomycin HCL	Lincomix
	Tylosin	Tylan
	Penicillin G Procaine	Pen-P, Penicillin G Procaine
Category III	Bacitracin	BMD, Albac, Zinc Bacitracin
Antibiotic Use in the Water		
Category II	Penicillin+Spectinomycin	Vibiomed Booster, Medivit, Super Booster

April 2018 – Chicken Farmers of Canada Raised by a Canadian Farmer On-Farm Food Safety Program – Chapter 6 Supplement

Producer Communication

- **Producer meetings and publications**
  - Since 2011
  - AMU Magazines
- **On-line Production Videos**
  - Brooding practices
  - Euthanasia
  - Water quality
  - Litter management



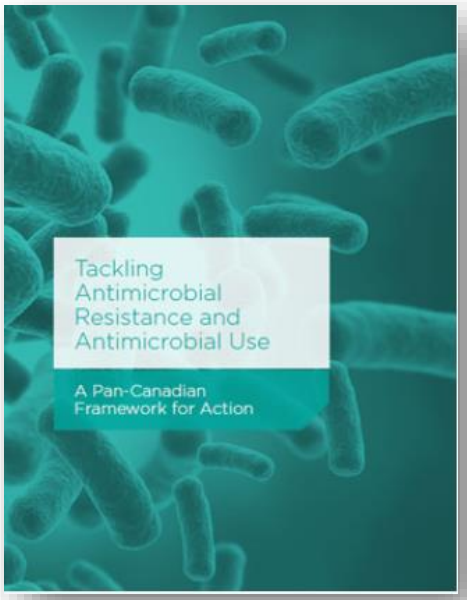


Key message: ***Work with your veterinarian, feed supplier and hatchery to assess opportunities***

Integration with the Pan-Canadian Framework on AMR and AMU

Government Initiatives

- **CFC strategy works in conjunction with the Pan-Canadian Framework on AMR and AMU**
  - Surveillance, Stewardship, Infection Prevention and Control, and Research & Innovation



- **New Regulations/Policies**
  - Increased veterinary oversight (Dec 1, 2018)
  - Removal of Growth Promotion label claims
  - Eliminating Own-Use importation of antibiotics
    - Already a requirement in CFC On-Farm Food Safety Program
  - Reporting of Antimicrobial Sales by total volume and species (beginning in 2019)

ACCESS TO ANTIMICROBIALS IS CHANGING – GET READY!

Health Canada is moving all Category II and III antimicrobials to the Prescription Drug List – this means that as of December 1, 2018 producers will need a veterinary prescription to access medically important antimicrobials, and the locations to obtain/purchase those antimicrobials will be changing.

This change will require producers to have a veterinary prescription prior to purchasing antimicrobials. In addition, antimicrobials that were previously available over the counter will only be sold by licensed veterinarians or pharmacists pursuant to a veterinary prescription. These changes will also impact producers that mix feed on-farm.

PLAN AHEAD!

IT IS IMPORTANT THAT PRODUCERS TAKE THE APPROPRIATE STEPS NOW TO FACILITATE THE IMPLEMENTATION OF THIS UPCOMING CHANGE. DISCUSS THIS CHANGE WITH YOUR VETERINARIAN AND SUPPLIER TO BE PREPARED FOR THE DECEMBER 1, 2018 IMPLEMENTATION DATE. FOR MORE INFORMATION VISIT THE HEALTH CANADA "RESPONSIBLE USE OF MIAS IN ANIMALS" WEB PAGE, THE CANADIAN ANIMAL HEALTH INSTITUTE'S WEBSITE, OR THE ANIMAL NUTRITION OF CANADA'S INFORMATION BROCHURE.

For further information, see Health Canada's website at bit.ly/AMR_CDN

CFC AMU Strategy and Health Canada Policy Implementation

- **National AMU Steering Committee**
  - Includes all stakeholders (farmers, hatcheries, processors, veterinarians, feed mills)
  - Meet regularly to help achieve the strategy objectives
    - Implementation and enforcement of the strategy
    - Focus on quality improvements throughout the value chain
    - To assess hurdles and opportunities

- **Provincial AMU working groups**
  - Involvement of stakeholders at the provincial level to help guide implementation and overcome obstacles

Chicken Farmers of Canada
Les Producteurs de poulet du Canada

Canada

Communication to Stakeholders

CANADIAN Chicken industry REDUCES antimicrobial use

REDUCTION TIMELINES

Step 1
Elimination of the preventive use of Category I antibiotics in May 2014

Step 2
Elimination of the preventive use of Category II antibiotics by the end of 2018

Step 3
Goal to eliminate the preventive use of Category III antibiotics by the end of 2020

Following the successful elimination of Category I antibiotics for disease prevention in Canadian chicken production in May 2014, Chicken Farmers of Canada (CFC) has established timelines to further its strategy to eliminate the preventive use of antimicrobials of human importance.

CFC's comprehensive antimicrobial use (AMU) strategy eliminates the preventive use of Category II antimicrobials by the end of 2018, and sets the goal to eliminate the preventive use of Category III antibiotics by the end of 2020.

The objectives and approach of CFC's strategy works in collaboration with the Canadian government's Pan-Canadian Framework on Antimicrobial Resistance and Antimicrobial Use.

CFC's policy will maintain the use of ionophores (those antimicrobials not used in human medicine) along with the use of antibiotics for therapeutic purposes to treat disease.

The key guiding elements of the reduction strategy include surveillance, stewardship, and research. CFC will continue collaborating on industry and government surveillance programs to monitor antibiotic use and the impacts of the reduction strategy, while CFC will invest in research to provide innovative solutions. Stewardship of antibiotic use will be promoted by reviewing best management practices, by increasing the availability of feed additives, and by focusing on quality throughout the stakeholder chain.

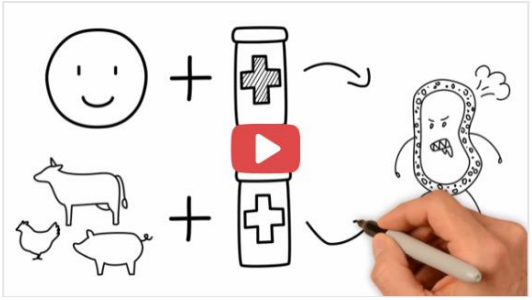
This strategy provides a sustainable means of meeting consumer expectations, protecting the health and welfare of birds, and preserving effective treatment options.

As always, consumers can be assured that Canadian chicken is free of antibiotic residues. Canada has strict regulations with respect to antibiotic use and withdrawal times to ensure that chicken reaching the marketplace does not contain residues, which is monitored by the Canadian Food Inspection Agency.

Letstalkchicken.ca

Consumer videos describing antibiotic use

Antibiotics and Canadian chicken

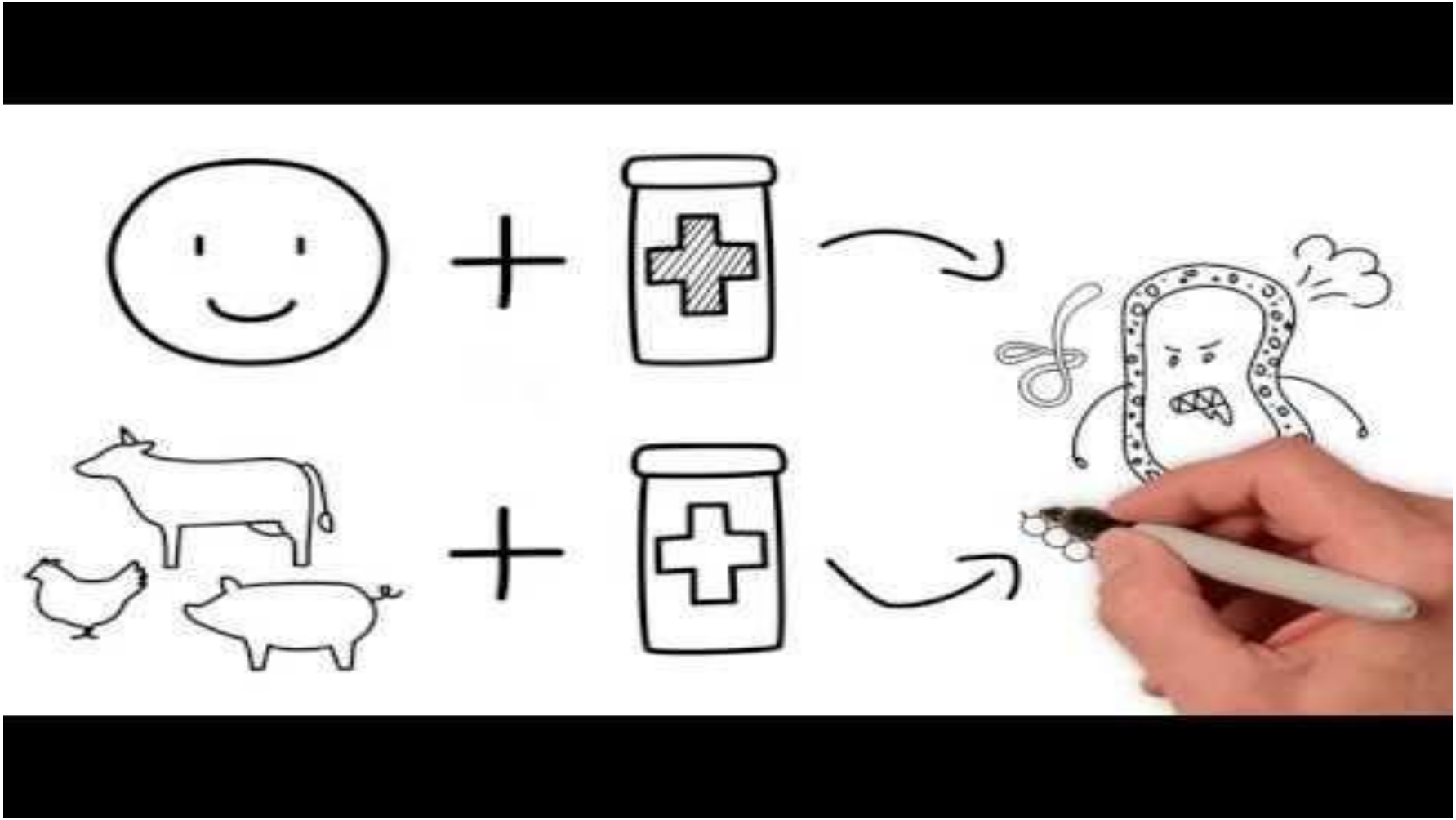


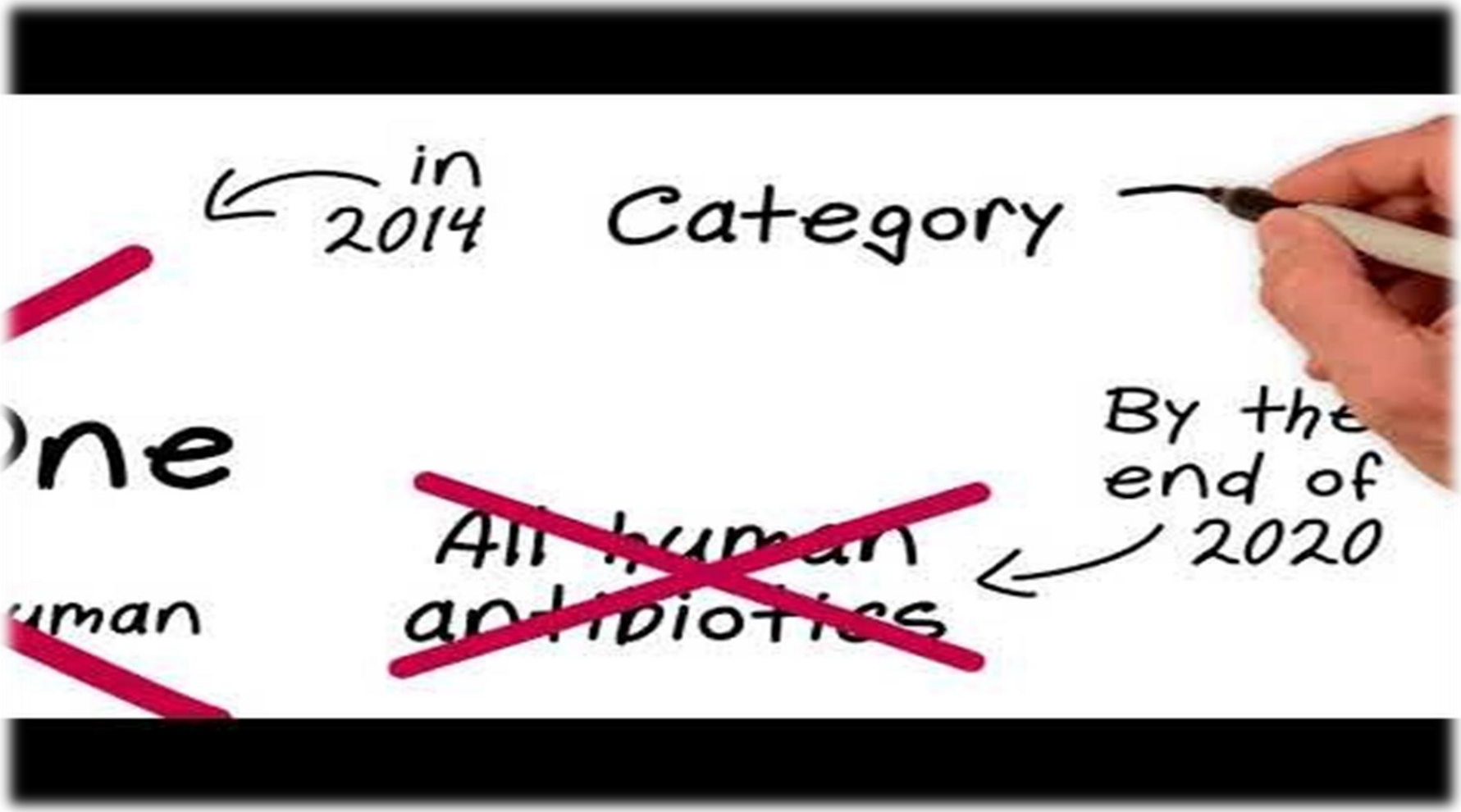
What is antibiotic resistance?

Are we actually eating antibiotics in chicken?

Can farmers use antibiotics?

Consumer brochures




in
2014
Category
By the
end of
2020

Actions to Address Implementation Challenges

- **Animal health and welfare**
  - Mortality and morbidity
  - Focus on management practices throughout the supply chain
- **Gut Health**
  - Funding research projects (e.g. vaccines for Necrotic Enteritis)
- **Availability of alternative products** (e.g. probiotics with proper labels)
  - CFIA and Health Canada have created a “gut modifier” category
- **Comparing apples to apples**
  - “Raised without the use of antibiotics” definition different between Europe and North America
  - Categorization of antibiotics differs between Canada and the USA

Thank you for this opportunity!

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