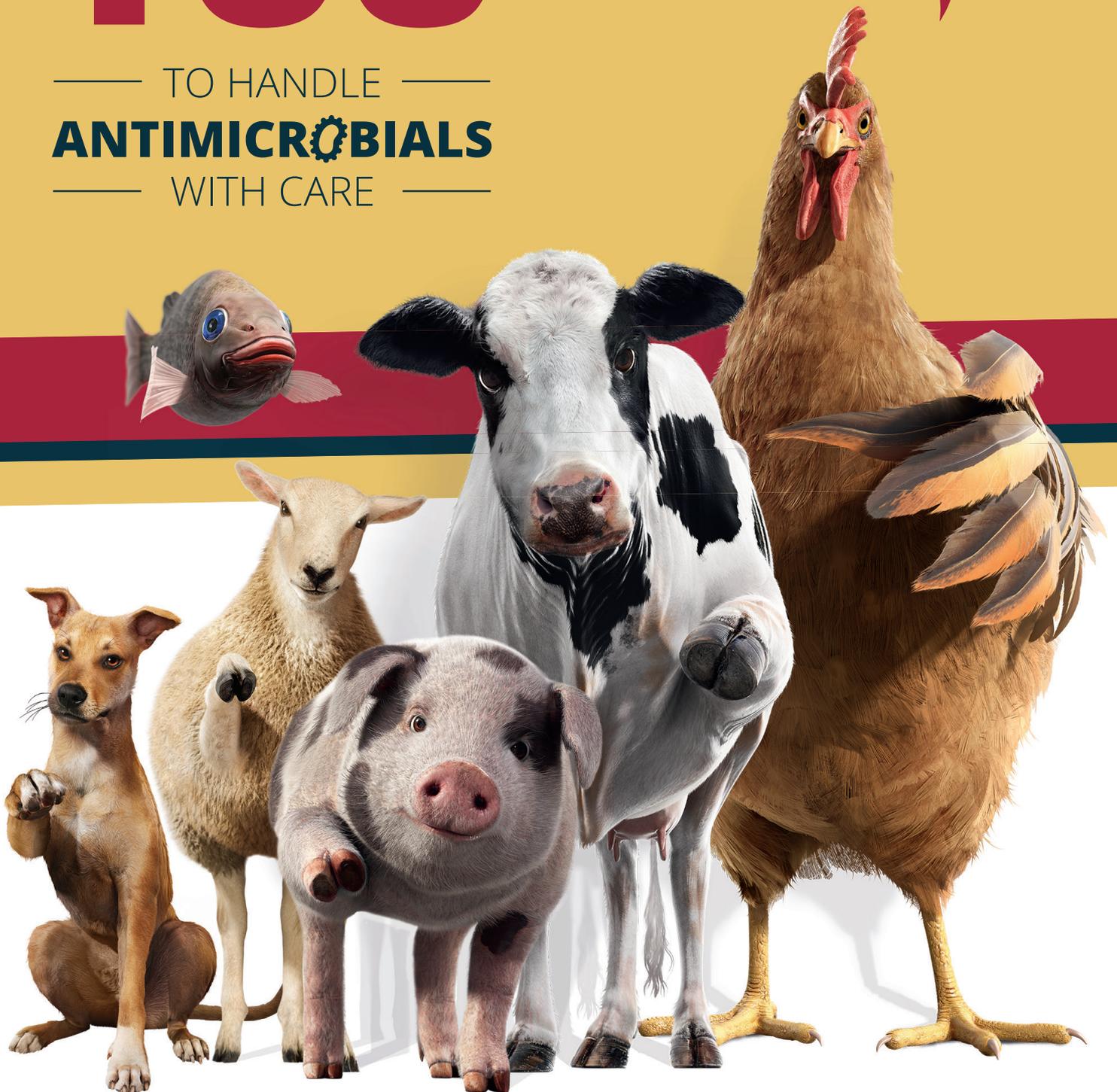


# WE NEED YOU

— TO HANDLE —  
**ANTIMICROBIALS**  
— WITH CARE —

WE ALL HAVE  
A ROLE TO PLAY!



WORLD ORGANISATION FOR ANIMAL HEALTH  
*Protecting animals, preserving our future*



**ANTIMICROBIALS ARE  
ESSENTIAL MEDICINES**



**HELP PROTECT THEIR  
ABILITY TO FIGHT INFECTION**

**ALL OF US CAN FOLLOW THE FIVE "ONLY" RULES**

1



Only use antimicrobials **when prescribed by a veterinarian**

2

Only use when needed, **antimicrobials do not cure every infection**



3



Only use the **dosage and follow length of treatment** and withdrawal period as prescribed

4

Only obtain antimicrobials **from authorised sources**



5



Only use when associated with **good animal husbandry, vaccination and hygiene practices**



**WE NEED  
YOU**

“ WE ALL HAVE A ROLE TO PLAY, AND YOU, AS ANTIMICROBIAL USERS, CAN HELP ”



Antimicrobials were discovered in the 20<sup>th</sup> century and have made a larger contribution to life expectancy than any other medication.

## ANTIMICROBIALS HAVE TRANSFORMED HUMAN AND VETERINARY MEDICINE. THEY SAVE LIVES!

**The emergence of resistance is a major concern:** effective medicines to control and treat animal and human diseases may soon no longer work. Antimicrobial resistance is a major threat to animal health and welfare, food supply and food safety – worldwide.

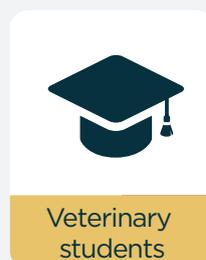
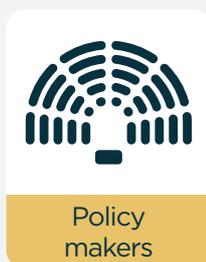
To ensure sustainability of livestock production and the maintenance of terrestrial and aquatic animal welfare, **the efficacy of antimicrobial agents must be preserved through their responsible and prudent use.**

## WE ALL HAVE A ROLE TO PLAY TO PRESERVE ANTIMICROBIAL EFFICACY.

The OIE has created the WE NEED YOU CAMPAIGN and developed tools specially designed for you, as an animal health stakeholder.

**The following document summarises how you can act to fight antimicrobial resistance.**

Discover what you can do: you can easily identify information based on your picto.



# Policy makers: you are the guardians



You, as policy makers, can help. Policy makers for the animal health sector have the key role of safeguarding animal health, human health, food supply and food safety at national level, supporting economic development.

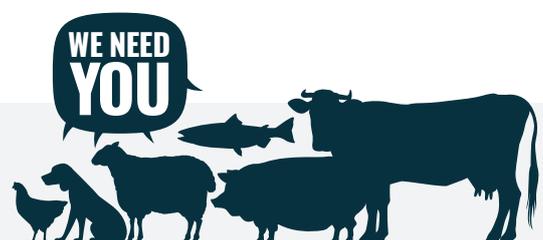
**Your role is ensuring the proper policies are in place from farm to fork – and beyond.**

## Policy makers should:

- 1 Ensure that legislation** supports responsible and prudent use of antimicrobials and that Veterinary Services which play a key role in the fight against AMR have the **capacity to implement legislation**.
- 2 Control the use of antimicrobials** under the supervision of well-trained veterinarians.
  - Ensure that antimicrobials can only be obtained with a **veterinary prescription**, based on scientific evidence.
  - **Support and fund minimum geographical coverage** by veterinarians for animal health surveillance.
  - Enable and support Veterinary Statutory Bodies which **oversee veterinary qualifications** as well as the ethical standards and professional excellence of veterinarians – including antimicrobial stewardship.
- 3 Prevent the importation, manufacturing and circulation of non-quality products.** Illegal sales should be brought under control and perpetrators should be prosecuted.
- 4 Support and finance research** into the development of methods for the prevention, diagnosis and treatment of diseases to reduce the dependence on antimicrobials, including rapid diagnostic tests and vaccines.
- 5 Support the organisation of awareness campaigns** on the responsible and prudent use of antimicrobials in animals among stakeholders.
- 6 Develop national programmes** to monitor antimicrobial use, based on OIE international Standards.



For more information:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)



# The pharmaceutical industry: you are the gatekeeper



You, the pharmaceutical industry, can help. The role of the pharmaceutical industry is to develop and manufacture safe and effective antimicrobials. The industry should help fight antimicrobial resistance by producing quality medicines and ensure they end up in the right hands and are used prudently and responsibly.

**Your leadership and influence is central to this fight, demonstrating the professionalism and commitment that you bring to the sector.**

## The pharmaceutical industry should:

- 1** Ensure the **safety, efficacy and quality** of their antimicrobials, and adhere to good manufacturing practices.
- 2** Obtain **marketing authorisation**, and comply with the **codes of advertising** to not advertise veterinary products containing antimicrobial agents directly to the food animal producer.
- 3** Only use **officially authorised distribution** systems for the marketing and export of veterinary medicinal products containing antimicrobial agents.
- 4** Cooperate with the competent authorities and **share detailed sales data** for the monitoring of antimicrobial use and surveillance of antimicrobial resistance.
- 5** **Highlight the risk of antimicrobial resistance** and the need for responsible and prudent use whenever providing or supplying antimicrobials.
- 6** Participate in **training on the prudent** and responsible use of antimicrobials.
- 7** Contribute to **research** to help combat antimicrobial resistance, prioritise and focus on developing **alternatives to antimicrobials**, such as vaccines and rapid and affordable diagnostic tests.

@ For more information:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)



# Animal feed manufacturers: you are the intermediaries



You, as a manufacturer of antimicrobial-containing feed for animals, can help. By limiting the access of medicated feed to veterinary prescription, you can counter overuse and misuse that leads to increased antimicrobial resistance.

**Your leadership and influence is central to this fight, demonstrating your professionalism and commitment to the sector.**

## Manufacturers of antimicrobial-containing feed for animals should:

- 1** Be **approved** for the manufacture of medicated feed, and follow all legal requirements for medicated feeds.
- 2** Only use **approved sources** of medicines. Ensure that only approved sources of medications are added to feed, at a level, and for a species and purpose permitted by the drug premix label or a veterinary prescription.
- 3** **Avoid contamination** with harmful agents and prevent contamination of non-medicated feed.
- 4** Implement **best manufacturing practices** for optimal hygiene and appropriate mixing to guarantee the homogeneity of antimicrobials in the feed.
- 5** Only supply to farmers following a **veterinary prescription**.
- 6** Ensure **appropriate labelling** (level of medication, approved claim, intended species, warnings and cautions) with product identification (ingredients, inclusion rates), directions for use and withdrawal time.
- 7** **Keep appropriate records** to allow traceability.
- 8** Cooperate with the competent authorities and **share sales and distribution data** for monitoring of antimicrobial use.

@ For more information:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)



# Wholesale and retail distributors: you are the sentinel



You, as antimicrobial distributors, can help. Because distributing drugs such as antibiotics comes with responsibilities, you should be aware of the importance of preserving the efficacy and availability of antimicrobials.

**Antimicrobials marketing and distribution falls under your responsibility and control. Your leadership and influence is central to this fight, demonstrating your professionalism and commitment to the sector.**

## Wholesale and retail distributors should:

- 1** Only use **approved sources** of medicines.
- 2** Manage veterinary antimicrobials in line with best **storage and transport** practices.
- 3** Ensure antimicrobials are **only distributed on the valid prescription of a veterinarian**, including if relevant in the case of nationally regulated internet sales.
- 4** Ensure all products are **appropriately labelled**. Provide clear and correct information on product use, expiry date and withdrawal period.
- 5** Comply with the **codes of advertising** that are compatible with the principles of responsible and prudent use.
- 6** Keep **detailed records** (supplier, prescriber, user, name of the product, batch number, quantity, shelf life) to allow traceability.
- 7** Cooperate with the competent authorities and **provide detailed sales data** for the monitoring of antimicrobial use.
- 8** Ensure all staff members are adequately **qualified**. Participate in and provide **training** on the appropriate storage, transport and disposal of antimicrobials.

@ For more information:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)



# Livestock owners: you are the producers



You as antimicrobial users can help. As food-producing animal owners – whether large scale producers, fish farmers, or the owners of backyard animals – you play a vital role in feeding the planet.

**You are responsible for providing safe, healthy produce to consumers by looking after the health and welfare of your animals.**

## Farmers and animal owners should:

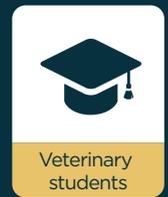
- 1 Only use antimicrobials when prescribed by a veterinarian** (or other suitably trained person authorised to prescribe veterinary drugs). Not every infection needs to be treated with antimicrobials.
- 2 Follow the exact dosing instructions** given by the veterinarian.
- 3 Follow the length of treatment** as prescribed – even if the animal seems to have recovered.
- 4 Only obtain antimicrobials from authorised sources** that can ensure the quality of the products.
- 5 Apply good animal husbandry, biosecurity and management** practices. Animal owners should develop a health plan for their animals with their veterinarian or an animal health professional to protect them from infection.
- 6 Keep adequate written records of all antimicrobials** used and of laboratory results.



For more information:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)



# Veterinary students: you are the future



You as future veterinarians can help. Your future work with animals, farmers and policy makers means that you will be at the frontline in the battle for antimicrobial resistance. It all starts with you, in your classrooms and during your field trainings!

**In contrast to many of your predecessors, you will be graduating in a time of increased antimicrobial resistance. Use your voice to help us preserve the efficacy of antimicrobials.**

## Veterinary students should:



**Learn how to choose and prescribe** antimicrobials appropriately



**Learn which antimicrobials are considered critical**, and always carry out a culture and sensitivity test in parallel with a first-line antimicrobial treatment.



**Follow expert guidelines** regarding antimicrobial use. Follow treatment guidelines. If your veterinary practice does not have them, offer to help set them up.



**Learn about biosecurity and animal hygiene.** Both play an important role in controlling and preventing infections.



**Never use antimicrobials as a blanket treatment**, or 'just-in-case'. Always check if antimicrobial treatment is really necessary, and if so, opt for the first-line choice.



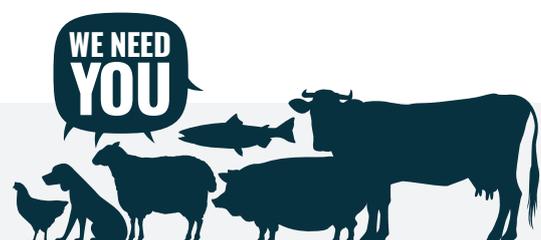
**Ask questions and don't hesitate to challenge treatment habits** – just because 'we've always done it like this' doesn't mean it's correct.



**Learn which antimicrobials are considered first-line treatment**, and learn about their action and tissue distribution.



For more information:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)



# Veterinarians: you are the headliners



You, as veterinarians or aquatic animal health professionals, can help. Being in contact with both animals and farmers, you are the frontline on the battle front of antimicrobial resistance.

**What can you do?** Use antimicrobials responsibly and prudently and advise your clients to preserve antimicrobials' efficacy.



## When and how should antimicrobials be used?

- Only after a clinical examination of the animal(s) by a veterinarian or trained animal health professional.
- Only when necessary taking into consideration the OIE List of antimicrobial agents of veterinary importance.
- Only in addition and never in replacement of good animal husbandry practices, hygiene, biosecurity and vaccination programmes.
- Only by making an appropriate choice of antimicrobial agent based on clinical experience and diagnostic laboratory information when possible.
- Always in addition to detailed information treatment protocols and withdrawal times.



## Choice of antimicrobial

### How to choose the appropriate antimicrobial?

Take into account:

- Farm records of previous antimicrobial use and epidemiological history of the farm.
- Clinical experience and diagnostic insight, with reference to relevantly available guidelines (e.g. national veterinary association).
- Diagnostic laboratory information when available (culture and sensitivity testing).
- Pharmacodynamics (activity against pathogens involved).
- Pharmacokinetics (tissue distribution, efficacy at infection site).
- The OIE list of antimicrobials of veterinary importance when choosing your treatment.

### What to do if first-line treatment fails?

- Second-line treatment should be based on results of diagnostic tests including sensitivity testing.
- In the absence of test results a different class or sub-class should be used.

### Can combinations of antimicrobials be used?

- Only if supported by scientific evidence.





## Appropriate use & prescriptions

### What should be written on the prescription for antimicrobials?

- **Dosage regimen** (dose, treatment intervals, duration of treatment).
- **Withdrawal periods** for meat and milk.
- **Amount of antimicrobial (to be) provided**, depending on dosage and number of animals.
- **Labelling of all veterinary drugs** supplied.

### When is extra-label or off-label antimicrobial use allowed?

- **In agreement with national legislation.**
- **When appropriate registered product isn't available.**
- **With client informed consent.**

It is the veterinarian's responsibility to define the conditions of responsible use including the dosage regimes, route of administration and withdrawal period in these cases taking into account recommendations of the OIE List.



## Data recording

### What data should be recorded by the vet?

- Quantities of **antimicrobials used per animal species.**
- **Details of all antimicrobials** supplied to each farm.
- **Treatment schedules** (including animal ID and withdrawal period).
- **Antimicrobial susceptibility data.**
- Comments concerning the **response of animals to treatment.**
- **Adverse reactions** including lack of response due to antimicrobial resistance.



## Train yourself and raise awareness of your clients on AMR

### Why?

- To help **keep your knowledge up-to-date** and to ensure **implementation of good practices of antimicrobial use.**

### About what?

- Information on **disease prevention and management.**
- **The ability of antimicrobials to select for resistance**, and the importance for human and animal health.
- The need to **observe responsible and prudent use recommendations.**
- **Appropriate storage conditions** and proper disposal.
- **Record keeping.**

### What guidelines should be developed?

- Veterinary professional organisations should **develop species-specific clinical practice recommendations** for the responsible and prudent use of antimicrobials.

### For more details, refer to the OIE international standards:

- **Article 6.9.6.**  
*Responsibilities of veterinarians of the OIE Terrestrial Animal Health Code.*
- **Article 6.2.7.**  
*Responsibilities of veterinarians and other aquatic animal health professionals of the OIE Aquatic Animal Health Code.*
- OIE List of antimicrobial agents of veterinary importance.



For more information:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)

# What is antimicrobial resistance and how it is threatening us?



- **Once bacteria are resistant, the antimicrobial agent (or medicine) is ineffective and can no longer help to control or treat diseases. This phenomenon is called antimicrobial resistance (AMR).**
- Antimicrobial resistance is a threat to the health and welfare of animals, whether aquatic or terrestrial. **Resistant bacteria can circulate between humans, animals and the environment and do not respect borders.** It is therefore, a global human and animal health concern.
- **Misuse and overuse of antimicrobials in animals, humans or plants is a major factor driving the emergence and development of antimicrobial resistance.** Indeed, any inappropriate use of antimicrobials (unnecessary use, use against non-susceptible bacteria or virus, under-dosage, etc.) increases the risk of resistance development.

Tackling pathogen resistance to antimicrobials is a priority objective of the World Organisation for Animal Health (OIE). Through its international Standards, the OIE advocates responsible and prudent use of antimicrobial agents – essential to animal health and welfare – by all animal health actors.

- For more details, refer to the OIE international standards:  
[www.oie.int/amrstandards](http://www.oie.int/amrstandards)
- To discover the campaign visit the dedicated website :  
[www.oie-antimicrobial.com](http://www.oie-antimicrobial.com)

