

The role and mandate of the World Organisation for Animal Health in veterinary education

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Summary

The World Organisation for Animal Health (OIE), which was created in 1924 under the name *Office International des Epizooties*, is in charge of setting international standards and guidelines for animal health and welfare. The original aim of the Organisation was to control the international spread of infectious animal diseases, but this aim has expanded over the years and now the OIE has a global mandate to 'improve animal health worldwide' for both terrestrial and aquatic animals. A vital factor in successfully fulfilling this mandate is the quality and performance of both the public and private components of national Veterinary Services, which are increasingly working at the interface between human, animal and environmental health. The OIE considers global veterinary education to be key in maintaining and improving the quality of these Veterinary Services. Consequently, the competencies and continuing education of veterinarians are a priority in the assessment tool that the Organisation has developed to evaluate the performance of Veterinary Services (PVS). Evaluating the abilities and training of veterinarians is an important part of a PVS evaluation, as well-educated veterinarians with appropriate training are essential in improving Veterinary Services worldwide and in helping the OIE to fulfil its mandate.

Keywords

Mandate – Performance – Veterinary education – Veterinary Services – World Organisation for Animal Health.

General introduction: the World Organisation for Animal Health

The World Organisation for Animal Health was created in 1924. The initial name of the Organisation was the *Office International des Epizooties* and the original acronym, OIE, has been retained. It is one of the oldest and, with its 175 Member Countries and Territories, one of the most representative of all intergovernmental organisations.

Present on all five continents through its network of more than 230 Collaborating Centres, Reference Laboratories and Regional and Sub-regional representations, the OIE manages the World Animal Health Information System (WAHIS), which alerts Member Countries and Territories

of disease events around the world, and plays a key role in advancing scientific knowledge and in disseminating animal health information. Operating at the interface between animal health, human health and the environment, the OIE takes a lead role among agencies supporting and financing the fight against animal diseases and helps its Members to prevent, control, and even eradicate these diseases. In its capacity as the international reference organisation for animal health and welfare, the OIE develops health and welfare standards in order to safeguard the food supply and ensure the health security of the world trade in animals and animal products within the framework of the World Trade Organization (WTO) Sanitary and Phytosanitary (SPS) Agreement.

Firmly committed to international cooperation and solidarity, the OIE provides support for the world's national

Veterinary Services, now recognised as a global public good, and sees strengthening their capacities as a priority for public investment.

The mandate of the World Organisation for Animal Health

The OIE was primarily created with the aim of controlling the international spread of infectious animal diseases. The original mission of the Organisation has expanded, and the new mandate is now to 'improve animal health worldwide'. This has considerably broadened the OIE's responsibilities. Now, not only does it require that its 175 Members share the same political will, but new institutional and technical mechanisms must also be developed at national, regional and worldwide level. To succeed, the OIE must provide policy makers with the right information, arguments and tools for this political will to be exercised effectively in a sustainable manner. These arguments must first and foremost be founded on a qualitative and quantitative evaluation of the political, social and economic benefits to be gained by investing more in new national, regional and worldwide animal health systems. Yet, to improve animal health and welfare, political will alone is not enough. The effectiveness of investments in animal health systems depends on good governance of the mechanisms intended to implement them. Veterinary Services, including both their public and private sector components, are in the front line when it comes to improving animal health. Increasing their effectiveness depends on the mobilisation of adequate human and financial resources, and on the application of the methods of good governance described in the OIE *Terrestrial Animal Health Code (Terrestrial Code)* and *Aquatic Animal Health Code (Aquatic Code)* (2, 5), both of which are adopted democratically as international standards by OIE Member Countries and are linked with the WTO SPS Agreement.

In order to improve animal health by making national Veterinary Services more effective, the OIE needs to be able to demonstrate that this field of activities still qualifies as a 'global public good'.

It is easy to demonstrate that the prevention and control of zoonoses, by implementing OIE standards and guidelines, is an essential component of public health policies. However, it is important to recognise that animal diseases also have an economic and social impact on rural economies, especially in developing countries, where a large percentage of the human population still depends on livestock breeding to survive. Therefore, the permanent threat that diseases pose to livestock raised in poor countries is also a threat to poor rural and out-of-town communities. The losses they are currently suffering from

animal diseases are already considerable and are likely to increase. It is important to reiterate that the control of animal diseases makes an important contribution to the fight against poverty and malnutrition throughout the world in terms of both public health and support for the economic and social development of the populations and countries concerned. Furthermore, effective control of animal diseases in these countries would help give farmers access to valuable markets from which they are currently barred as they are not able to control or eliminate the most important diseases.

Investing in new animal health systems throughout the world thus helps not only to protect countries from natural or intentional threats linked to the reintroduction of previously eliminated infectious animal diseases (including zoonoses), but also to safeguard public health, reduce poverty and open to all the opportunity to trade agricultural products freely with the rest of the world. It is vital that effective animal health systems and veterinary surveillance networks are in place everywhere, since early detection of diseases and immediate response are the keys to effective prevention and control of natural or intentional animal disease disasters. To help ensure that Veterinary Services can build effective surveillance and response networks the OIE has developed an assessment tool to evaluate the 'Performance of Veterinary Services' (PVS tool). The OIE can carry out a PVS evaluation in any Member Country that so wishes and this enables Veterinary Services to identify priority areas for investment. As the quality of national Veterinary Services depends in large part on the capability of their personnel and the initial and continuing training they receive the PVS evaluation includes an assessment of the competencies of veterinarians and para-professionals and an evaluation of their continuing education (4).

OIE Objectives

As part of its mandate to improve animal health worldwide, the OIE has six primary objectives, each of which is described here.

Surveillance and control of animal diseases

Globalisation and consumerism encourage the circulation of pathogens (and their increased virulence because of genetic exchanges) and are conducive to the spread of animal diseases. The OIE, acting as the hub of the international animal disease surveillance and response system and the driving force behind world veterinary research, is in the front line against the threat from animal diseases, including zoonoses. Central to the complex and close relationship between humans and animals are the infectious diseases. Today, the world's human and domestic

animal populations are in a perpetual state of movement and interaction, their numbers are continually increasing and they have never been so close together: through the environment, agriculture and livestock, growth of trade in animals and animal products, and through our food.

Dramatic events and spectacular crises serve as a constant reminder of the devastating consequences of these emerging or re-emerging diseases.

Transparency of animal health information

Faced with these threats, one of the essential missions of the OIE is to ensure transparency in the animal disease situation worldwide. Member Countries are under an obligation to inform the OIE of any epidemiological event related to a disease that appears on the OIE list of notifiable diseases. Any significant occurrence of an emerging disease (e.g. a sudden increase in morbidity or mortality) must also be reported. The OIE can then alert the international community so that each country can take the necessary precautions.

The OIE also establishes the list of countries that are officially free of diseases that Member Countries consider pose a particularly serious threat. WAHIS, linking each Member Country to the OIE, ensures the transparency and rapid transmission of animal health data. Most importantly, it enables the immediate notification of any event involving emerging or re-emerging diseases detected by Members. WAHIS allows the OIE to immediately make public, by means of internet, email and fax, any epidemiological event reported by a Member Country. At the same time WAHIS feeds a database, WAHID, which includes a web interface open to the public, containing all the information and maps provided by the 175 OIE Members.

Sharing scientific expertise

As already mentioned, the OIE is a driving force for worldwide veterinary research. Through its network of more than 220 Reference Laboratories and Collaborating Centres, the OIE collects, analyses and publishes scientific data to help Member Countries in their fight against terrestrial and aquatic animal diseases (1, 3).

OIE experts also assist countries facing major epidemiological crises, thus carrying on the veterinary profession's tradition of dedication and solidarity.

The OIE's internationally recognised veterinary expertise makes it the ideal partner of other international public health bodies in a wide range of programmes covering research, animal health training, and awareness campaigns for populations at risk.

For instance, in 2005 the OIE and the Food and Agriculture Organization of the United Nations (FAO) launched a worldwide scientific network to support Veterinary Services in the diagnosis of avian influenza. The network, which was originally named OIE/FAO network of expertise on avian influenza (OFFLU), has now extended its remit to include other animal influenzas and is now known as the OIE/FAO network of expertise on animal influenza. This initiative also enables active cooperation with the World Health Organization (WHO) on matters relating to the animal-human interface.

Another example of successful international cooperation and information sharing is the creation of the Global Early Warning System (GLEWS). This system, which was jointly developed by the OIE, the WHO and FAO, combines and coordinates the disease information and alert mechanisms of the three organisations in order to create an improved system for alerting the global community to animal disease threats.

Safeguarding trade and consumers

Recent epizootics have shown the extent to which a serious animal disease event can have direct consequences for the economy of the world's livestock production industries as well as for public opinion, trade and the global economy.

At the higher end of the food chain, tensions exist between production sectors and increasingly competitive markets and this is often particularly problematic for producers in developing and in-transition countries where there is no government or professional price regulation. At the lower end of the chain, the relationship between consumers and food products of animal origin is fragile: public opinion is increasingly concerned about the safety of the food chain, and the market for a particular product can collapse overnight if consumers have doubts about its safety.

In fact, the globalisation of trade requires a scientific approach to the control of hazards, and Veterinary Services have among others a decisive role to play in the sanitary certification of exported products.

Consequently, the international community has given the OIE the mission of developing sanitary standards for assuring the safety of international trade in animals and animal products.

Ensuring the health security of world trade

The OIE's standard-setting work falls within the framework of the WTO SPS Agreement, which came into force in 1995. Signatory countries of the SPS Agreement can be required to provide scientific justifications for applying standards that differ from those of the OIE.

The *Terrestrial Code*, the *Aquatic Code*, the *Manual of Diagnostic Tests and Vaccines for Terrestrial Animals* and the *Manual of Diagnostic Tests for Aquatic Animals* bring together the sanitary, technical and organisational rules published by the OIE relating to the recognition of the animal health status of Member Countries and the conditions governing trade in animals and animal products.

Undeniably science-based, the standards developed by the OIE are the result of a broad consensus of the veterinary authorities of Member Countries, by whom they are democratically adopted. It is compliance with these standards that guarantees the international community effective health protection and ensures the continuity of world trade.

Safeguarding the food chain

Faced with the development of zoonotic risks associated with the world's food system, the OIE is stepping up its action to achieve better food safety and is developing new synergies with the Codex Alimentarius Commission. The OIE is thus extending its standard-setting activity in the phases prior to the slaughter of animals and the primary processing of animal products.

The OIE is also very active in evaluating and strengthening the quality of national Veterinary Services, in their capacity as guarantors of food safety and veterinary public health. More and more public-sector veterinarians are working in these areas and ever-increasing numbers of private-sector players are working with national Veterinary Services in roles connected to the chain of surveillance and the certification of animal products. The work of both public and private veterinarians is evaluated by the OIE as it seeks to strengthen the involvement of Veterinary Services in safeguarding the food chain.

Animal welfare and well-being

The OIE standards also lead the way on animal welfare.

The concepts of 'animal health' and 'animal welfare' are closely linked through their common scientific, ethical, economic and political dimensions. Animal health is a key component of animal welfare. Today, animal welfare is a topical issue, due to a very wide public interest in animal protection and the need for more countries to gain access to international markets while respecting consumers' demands in this field. Despite their cultural and religious diversity, the Member Countries of the OIE wished to have guidelines and recommendations on this topic, even though it does not fall within the scope of the WTO SPS Agreement. The OIE's initial work in this field gave priority to the welfare of animals used in agriculture and aquaculture, and more specifically to questions relating to

their transport and slaughter, and their killing for disease control purposes. As the world reference organisation for animal welfare, the OIE endeavours to involve as many stakeholders as possible – non-governmental organisations, universities, research institutes, production sectors, companies and consumers – to ensure that the guidelines and recommendations proposed can be applied by all its Member Countries and Territories. The OIE has now started to publish standards in the field of laboratory animals, aquaculture, stray dog control, animal production systems, wildlife control and harvesting methods.

Evaluating the competencies and continuing education of veterinarians

The OIE would not be able to reach its objectives without the work of public and private components of national Veterinary Services, so ensuring that veterinarians are well-trained and highly competent worldwide is a priority for the Organisation. Consequently, an assessment of the competencies of veterinary personnel and the initial and continuing education they receive is a crucial part of OIE-PVS independent evaluations.

Competencies

The PVS assessment consists of evaluating the capability of the Veterinary Services (including veterinarians, veterinary paraprofessionals and other staff) to efficiently carry out their veterinary and technical functions, as measured by the academic qualifications of their personnel in veterinary and other professional and technical positions (4).

There are five levels of advancement, as follows:

- the veterinarians' practices, knowledge and attitudes are of a variable standard and usually only allow Veterinary Services to carry out elementary clinical and administrative activities
- the veterinarians' practices, knowledge and attitudes are of a uniform standard and usually allow Veterinary Services to carry out appropriate clinical and administrative activities
- the veterinarians' practices, knowledge and attitudes usually enable Veterinary Services to carry out all the professional/technical activities that are required of them (e.g. epidemiological surveillance, early warning, public health, etc.)
- the veterinarians' practices, knowledge and attitudes usually enable Veterinary Services to undertake specialised activities as needed

– the veterinarians' practices, knowledge and attitudes are subject to regular updating, international harmonisation, or evaluation.

Veterinary Services that are considered to have reached Level 5 will have demonstrated that they fully and ideally comply with the requirements for veterinary personnel outlined in Article 3.1.2. of the *Terrestrial Code* – 'Fundamental principles of quality'. Each of those principles is described here.

Fundamental principles of quality

Professional judgement

The personnel of Veterinary Services should have the relevant qualifications, scientific expertise and experience to give them the competence to make sound professional judgements.

Independence

Care should be taken to ensure that Veterinary Services personnel are free from any commercial, financial, hierarchical, political or other pressures which might affect their judgement or decisions.

Impartiality

The Veterinary Services should be impartial. In particular, all the parties affected by their activities have a right to expect their services to be delivered under reasonable and non-discriminatory conditions.

Integrity

The Veterinary Services should guarantee that the work of each of their personnel is of a consistently high level of integrity. Any fraud, corruption or falsification should be identified and corrected.

Objectivity

The Veterinary Services should at all times act in an objective, transparent and non-discriminatory manner.

Continuing education

The evaluation of the continuing education of veterinarians and of staff of Veterinary Services assesses the capability of the Veterinary Services to maintain and improve the competence of their personnel (their knowledge and understanding of relevant information), measured in terms of the implementation of an annually reviewed training programme.

The levels of advancement are as follows:

– the Veterinary Services have no access to continuing veterinary, professional or technical education

– the Veterinary Services have access to continuing education (internal and/or external programmes) on an irregular basis but it does not take into account needs, or new information or understanding

– the Veterinary Services have access to continuing education that is reviewed annually and updated as necessary, but it is implemented for less than 50% of the relevant personnel

– the Veterinary Services have access to continuing education that is reviewed annually and updated as necessary, and it is implemented for more than 50% of the relevant personnel

– the Veterinary Services have up-to-date continuing education that is implemented for all relevant personnel.

Veterinary statutory bodies

Veterinary statutory bodies are not part of national Veterinary Services, but they are responsible for issuing veterinary licences and determining minimum standards of veterinary education. As they have a large part to play in maintaining and improving veterinary education and practices the OIE includes an assessment of veterinary statutory bodies in its PVS evaluations.

Chapter 3.2.12. of the *Terrestrial Code* defines veterinary statutory bodies as autonomous authorities that regulate veterinarians and veterinary para-professionals. It states that any evaluation of a veterinary statutory body may consider the following items depending on the purpose of the evaluation:

- objectives and functions
- legislative basis, autonomy and functional capacity
- the composition and the representation of the body's membership
- accountability and transparency of decision-making
- sources and management of funding
- administration of training programmes and continuing professional development for veterinarians and veterinary para-professionals.

The veterinary statutory body should define its policy and objectives, including detailed descriptions of its powers and functions, for example:

- to regulate veterinarians and veterinary para-professionals through licensing and/or registration of such persons

– to determine the minimum standards of education (initial and continuing) required for degrees, diplomas and certificates entitling the holders thereof to be registered as veterinarians and veterinary para-professionals

– to determine the standards of professional conduct of veterinarians and para-professionals and to ensure these standards are met.

The influence of national veterinary statutory bodies is paramount in improving the quality of initial and continuing veterinary education. As the Organisation that sets standards for these bodies the OIE is able to ensure that they are able to set appropriate minimum educational requirements for veterinarians.

Conclusion

The OIE considers global veterinary education a key component of the quality of Veterinary Services.

In a rapidly changing world, veterinary education must face new challenges and continually evolve to meet societal demands in the fields of food security, food safety, animal and public health, and animal welfare.

Appropriate education and training have a direct effect on the quality and performance of public and private components of Veterinary Services; therefore, the OIE is considering the issue of initial and continuing veterinary

education as part of its commitment to encouraging its Members to strengthen the animal health policies and activities of their national Veterinary Services. Well-educated public and private veterinarians who have received appropriate training will help the OIE to fulfil its global mission: improve animal health worldwide.

To help ensure that veterinary education will prepare students to meet future challenges at international level and be able to play a role in improving the quality and performance of their national Veterinary Services, the OIE is organising a conference entitled 'Evolving veterinary education for a safer world'. This meeting will be an opportunity for deans and key national health policy makers from all over the world to exchange views on priorities for the content of academic courses, the main purpose being to reach consensus in order to recommend an updated veterinary curriculum to the international community. This should ensure that future graduates are increasingly able to work in an international environment, applying international standards for disease surveillance, veterinary public health, food safety and animal welfare. The conference will also provide a forum for discussing the involvement of veterinary statutory bodies in the harmonisation of accreditation procedures for veterinary faculties, which would help foster recognition of the importance of veterinary activities for society as a whole at global level.



Le rôle et la mission de l'Organisation mondiale de la santé animale dans le domaine de l'enseignement vétérinaire

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Résumé

Créée en 1924 sous le nom d'« Office international des épizooties », l'Organisation mondiale de la santé animale (OIE) a pour mission d'élaborer les normes internationales et les lignes directrices en matière de santé animale et de bien-être des animaux. À l'origine, le but de l'Organisation était d'empêcher la propagation internationale des maladies animales infectieuses, mais avec le temps cette mission s'est élargie et le mandat global de l'OIE est désormais d'« améliorer la santé animale partout dans le monde », aussi bien celle des animaux terrestres qu'aquatiques. Les facteurs essentiels pour réaliser cet objectif sont la qualité et les performances des composantes publiques et privées des Services vétérinaires nationaux, qui travaillent de plus en plus à l'interface entre la santé humaine, la santé animale et la santé environnementale. L'OIE considère l'enseignement vétérinaire comme un atout

déterminant pour préserver et améliorer la qualité de ces Services vétérinaires. En conséquence, la qualification et la formation continue des vétérinaires figurent parmi les priorités de l'outil mis au point par l'OIE pour évaluer les performances des Services vétérinaires (outil PVS). L'évaluation des aptitudes et du niveau de formation des vétérinaires est un aspect important des évaluations PVS dans la mesure où il faut pouvoir compter sur des vétérinaires qualifiés et bien formés pour améliorer les Services vétérinaires à l'échelle mondiale et pour aider l'OIE à réaliser ses objectifs.

Mots-clés

Enseignement vétérinaire – Mandat – Organisation mondiale de la santé animale – Performance – Services vétérinaires.



Función y mandato de la Organización Mundial de Sanidad Animal en materia de enseñanza veterinaria

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Resumen

La Organización Mundial de Sanidad Animal (OIE), creada en 1924 bajo el nombre de 'Oficina Internacional de Epizootias', tiene a su cargo la definición de normas internacionales y directrices en materia de sanidad y bienestar animales. Aunque su objetivo original se cifraba en el control de la propagación internacional de enfermedades animales infecciosas, sus funciones se han ido ampliando con los años, y ahora la OIE tiene el mandato global de 'mejorar en todo el mundo la salud de los animales', tanto terrestres como acuáticos. Un factor de vital importancia para cumplir con éxito tal mandato estriba en la calidad y eficacia de los componentes tanto públicos como privados de los Servicios Veterinarios nacionales, que cada vez más trabajan en la interfaz entre salud humana, animal y ambiental. La OIE entiende que la enseñanza veterinaria mundial es una de las claves para mantener y mejorar la calidad de dichos Servicios Veterinarios. De ahí que las competencias y la formación continua de los veterinarios constituyan uno de los elementos prioritarios en el instrumento que la Organización ha elaborado para evaluar la eficacia de los Servicios Veterinarios (Herramienta PVS). La posibilidad de evaluar las aptitudes y la formación de los veterinarios es uno de los ingredientes importantes de una evaluación PVS, pues la existencia de profesionales bien formados y preparados es fundamental para mejorar los Servicios Veterinarios en todo el mundo y ayudar a la OIE a cumplir su mandato.

Palabras clave

Eficacia – Enseñanza veterinaria – Función – Mandato – Organización Mundial de Sanidad Animal – Servicios veterinarios.



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