

Matching veterinary school accreditation to the global needs of the profession and global society

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Summary

In North America, the United Kingdom and Australasia, veterinary school accreditation is an integral part of the process of registering veterinarians to practise. In these regions, the relevant accrediting authority develops a set of standards which form the basis for individual schools to prepare a self-evaluation report, in preparation for a site-visit team to spend a week validating the self assessment. Global trends in food production and animal movement increase the potential for spread of animal diseases and demands from trading partners to guarantee food quality standards. These and other trends in the practice of veterinary medicine require schools to continually review their curricula to accommodate workplace demands. Accreditation systems in the western world have been working together to improve collaboration and review standards but, to date, there has not been an international agency with responsibility for facilitating development of evolving and new systems. It is suggested that the World Organisation for Animal Health could consider whether it has a role in improving veterinary education by assisting in this area.

Keywords

Accreditation – Quality of education – Veterinary registration – Veterinary schools – Veterinary standards.

Introduction

In a world where the production and trading of animals and animal products operates on a global scale, countries face huge challenges to reduce the spread of animal diseases, especially those that have the potential to infect humans or cause major disruptions to trade. Veterinarians have a key role in planning and enforcing legislation on the production, movement and welfare of animals and it is important that governments are able to assess the training and registration of veterinarians in their trading-partner countries. In addition, there is an increasing desire for veterinarians to broaden their experience by working in

other countries and this is much easier if there are mechanisms that facilitate recognition of their veterinary training.

In countries where veterinarians have to be registered to practise, the process of accrediting veterinary colleges is a valuable tool for registration authorities to assess the competence of graduates from local and international veterinary schools. The relative weighting given to accreditation when assessing the suitability of graduates for registration varies between countries. However, graduation from an accredited school is increasingly a basic requirement for further consideration. In recent years there have been attempts to review accreditation systems used in

different parts of the world, with a view to a greater degree of understanding and harmonisation. This paper describes current systems of veterinary school accreditation and explores options to enhance global trade in animals and animal products and simplify the movement of veterinarians between countries.

Existing accreditation systems

The accreditation of veterinary schools has a long history in North America and the United Kingdom (UK) (1, 5), and this approach is also used in a number of other countries and regions, including Australasia, Europe, South Africa, Mexico and South America. The key features of the veterinary school accreditation systems in Australasia, North America and Europe are: an emphasis on agreed performance standards, self evaluation by the school to be accredited and an on-site visit by a team of experts who validate the self assessment and examine performance against the relevant standards. It is important that the process has legislative backing and it is highly desirable that the standards are reviewed periodically, by representatives of the veterinary schools, the veterinary profession and the public, to ensure that they remain relevant and that graduates from accredited schools are performing well in practice. It is not expected that all schools will adopt the same approach to educating veterinarians and the challenge for organisations with responsibility for accreditation is to ensure that standards are being maintained without limiting the scope for innovation in curriculum design.

The organisations responsible for veterinary school accreditation vary between countries, depending on the arrangements for registering veterinarians. In Australia and New Zealand, the state registration boards and New Zealand Veterinary Council are responsible for registering veterinarians and they work together as the Australasian Veterinary Boards Council (AVBC), which has a standing committee responsible for reviewing veterinary school performance. The Veterinary Schools Accreditation Advisory Committee (VSAAC) comprises people nominated by the AVBC, the Australian Veterinary Deans' Committee, and the Australian and New Zealand Veterinary Associations (2).

In the UK, veterinary accreditation is the responsibility of the Royal College of Veterinary Surgeons (RCVS). In the United States of America (USA) and Canada, accreditation of veterinary schools is the responsibility of the American Veterinary Medical Association (AVMA) Council of Education. In Europe, the responsibility initially lay with the European Commission, which was advised by an Advisory Committee on Veterinary Training. However, in 2000, the Commission decided that it would cease to be

involved and devolved responsibility to a joint Education Committee of the European Association of Establishments for Veterinary Education (EAEVE) and the Federation of Veterinarians of Europe (FVE) (4). There is no reason to believe that the credibility of any system is influenced by its organisational framework, provided that the decision-making body operates at some distance or 'at arm's length' from the veterinary schools and there are rigorous rules to avoid any real or perceived conflicts of interest for those responsible for assessment decisions.

Accreditation process

The following description of the accreditation process is derived from the *VSAAC Policies, Procedures and Guidelines* (2) used in Australia and New Zealand, with comments on other systems to illustrate their differences.

A comparison of accreditation processes in different countries has been developed by the Tufts Cummings School of Veterinary Medicine (www.tufts.edu/vet/avm/index.html).

Standards

Organisation

The school must show evidence of how it achieves its defined mission statement. The AVBC requires the veterinary school to be a major administrative division of a registered higher education provider and to have a Dean who is a locally registered veterinarian.

Finances

Finances must be shown to be adequate to sustain the educational programmes and implement the mission of the school, and must be reasonably assured for the accreditation period.

Facilities and equipment

All aspects of the physical facilities must provide an environment conducive to learning and be sufficient to accommodate students and academic and support staff. Each veterinary school must maintain or be formally associated with a veterinary hospital that provides best-practice veterinary medicine and surgery. Facilities for housing animals used in teaching and research must be sufficient in number and appropriately designed and maintained.

Library and learning resources

Adequate library, electronic media and related information services must be available to support the objectives of the

school and lend support to undergraduate education, research and postgraduate studies.

Animals and related resources

Institutions need to demonstrate that students have supervised, intramural exposure to the major production- and companion-animal species seen by veterinary practices in Australasia.

Admission and students

The selection criteria must be consistent with the mission of the school, and the number of students selected must be able to be taught to AVBC standards with the resources available to the school.

Curriculum

The curriculum must be designed to meet the educational objectives of the school. The educational process and support must be focused on student learning and demonstrate that preparation for life-long learning is part of the development of each veterinary student. The curriculum must demonstrate the stimulation of enquiry, development of analytical and problem-solving abilities and promotion of professional attitudes in students.

Clinical resources and clinical learning and teaching

Evidence must be provided that students receive a standard of clinical instruction that will provide them with knowledge, skills, professional attributes and learning skills commensurate with a specified list and the 'day one' skills (i.e. skills available from the moment of graduation) nominated by the RCVS.

Academic and support staff

Staff numbers and qualifications must be sufficient and appropriate to deliver the educational programme and fulfill the mission of the school.

Postgraduate training and continuing education

Veterinary schools should establish postgraduate and continuing education programmes that provide opportunities for the advancement of veterinary knowledge.

Research

The veterinary school must demonstrate significant and broad research activities among staff that integrate with and strengthen the veterinary degree programme through research-led teaching.

Outcomes assessment

Outcomes assessment measures that address the mission of the school must be developed and implemented. Evidence

may be provided from outcomes assessment results, such as graduate destination surveys and surveys of employers to show that graduates have acquired day one skills. Evidence should be provided to demonstrate that the results of previous outcomes assessment have been used to improve the quality of the degree programmes in the school.

Self evaluation

Veterinary schools are required to be re-accredited every six years in Australasia and after a period of between five and ten years in other jurisdictions. The process is initiated approximately 12 months before a planned site visit, when a time for the visit is negotiated with the school. The school then commences a self-evaluation process that produces a comprehensive report, measuring performance against each of the standards. The *VSAAC Policies, Procedures and Guidelines* publication and equivalent publications from the RCVS, AVMA and EAEVE provide detailed information on the preferred content of the report, which is submitted six weeks before the site visit and studied by the visiting review team.

Site visit

One crucial factor influencing the credibility and effectiveness of accreditation is the experience, impartiality and credibility of the site-visit team. Typically, a team is composed of a Chair and about six other members, who are each allocated responsibility for specific standards. Site visits generally take five or six days and begin with a meeting of team members, to discuss their impressions of the report and identify areas that are unclear or appear to be deficient. This initial meeting is also important for team building and training members who have limited or no experience in site visits.

The next phase of the visit is to interview the academic staff about all aspects of the veterinary education programme, and to supplement this by discussions with students, recent graduates and employers of recent graduates. While individual site-visit team members have specific responsibilities, it is preferred that all interviews are conducted by the entire site-visit team. During the course of the visit, the team will examine the facilities used for educating veterinary students, including off-campus sites if these provide an important element of the training.

Towards the end of the week, the site-visit team will share their conclusions and prepare an agreed position that is presented orally to senior officers of the school and the head of the parent university. It is emphasised that these impressions are those of the site-visit team and that decisions on accreditation will be made by the AVBC or their equivalent organisations in other countries.

The site-visit team prepares a report, including recommendations, which is subsequently submitted to the

AVBC for a decision on whether the school should or should not be accredited. Accreditation can be given for the full period or for a shorter period, and may be subject to the implementation of a number of recommendations.

New schools

New schools to train veterinarians are being established around the world and, in many instances, they are adopting innovative approaches to education that are driven by a number of considerations, such as:

- the educational philosophy of the parent university
- a desire to make full use of existing resources in the university
- an intention to train their graduates for careers in specific target markets.

These new approaches may pose challenges for the accreditation process and have prompted the AVBC to adopt a policy of working with the new school early on in its development, to clarify the requirements for accreditation and identify potential difficulties while there is still time to modify courses.

In Australasia, the AVBC has adopted an approach based on AVMA experience. This approach involves the following steps:

- At the request of the university, VSAAC will conduct a review, including a site visit, of the planned degree programme. If the AVBC believes that the new school is likely ultimately to achieve compliance with accreditation standards, then a letter of 'reasonable assurance' is sent to the university.
- If a veterinary school granted 'reasonable assurance' is making adequate progress in complying with the standards, a short period of accreditation may be granted.
- In the first semester of the second year of the initial class, a full site visit is conducted. If the school is deemed to be making reasonable progress in complying with the standards, the short-term accreditation may be continued. If serious deficiencies are detected, then the AVBC may withdraw accreditation.
- A full site visit is conducted during the final year of the initial intake. If the AVBC determines that the school is in compliance with each standard, full accreditation will be granted.

Accreditation: future challenges

While accreditation of veterinary schools has had a key role in maintaining veterinary educational standards in

many countries, it is essential that the process is continually reviewed, to ensure that it is meeting community and professional needs. The demands on the veterinary profession are changing, in response to such things as:

- the global trade in food production
- expectations of greater integrity in livestock production systems
- the intensification of animal production systems
- the international movement of production and performance animals
- potential global pandemics
- community concerns about emerging diseases of animal origin
- community expectations and willingness to pay for expensive veterinary treatment
- the increasing diversity of animals being used for food production and recreational purposes
- evolving technologies, such as biotechnology, nanotechnology and information technology
- climate change.

There is no doubt that the veterinary workplace will continue to change rapidly, requiring changes in veterinary education. For accreditation to continue to play an important role in maintaining the quality and relevance of veterinary education, it must also continually re-assess its own processes and procedures, making appropriate adjustments to meet changing circumstances.

Why accredit veterinary schools?

In considering the role of veterinary school accreditation in a rapidly changing world, it is useful to ask whether there are other options for maintaining standards in veterinary education. Other possibilities include:

- leaving veterinary schools to set their own standards and negotiate with the relevant authorities on the requirements for registration
- an independent examination system as a pre-requisite for registration.

Some countries, such as the USA, do have an examination system as a pre-requisite for registration, but it is supported by an accreditation system. Other countries use an examination system to assess the qualifications of foreign graduates. The competence of a veterinary graduate is composed of attributes that include knowledge and understanding, as well as skills and attitudes affecting professional behaviour. Examining veterinary graduates

has traditionally been used to assess knowledge but is considered to be less effective in assessing skills and attitudes. It can also be argued that holding an examination for registration can encourage students to focus on the expected content of the examination, rather than on the range of learning experiences that contribute to their total professional development, and which will contribute to successful careers after graduation and for the remainder of their working lives.

Accreditation has a long history of maintaining standards for veterinary education. A brief summary of its strengths, weaknesses, opportunities and disadvantages is given in Table I.

Keeping accreditation relevant to changing educational philosophies and workplace demands

It is reasonable to assume that demands for change in the veterinary workplace will continue and that this will put pressure on veterinary schools to produce veterinarians who can work in different environments and have the capacity to change direction a number of times during their career. It has long been apparent that increasing community expectations of veterinary graduates cannot be met by simply presenting more information to those same undergraduates. Thus, there has been a substantial shift in emphasis to identify the attributes that assist someone to become a successful veterinarian. Organisations responsible for accrediting veterinary schools have adapted to this changing emphasis by identifying competencies that are required in a veterinary surgeon. Focusing on competencies is a challenge for accreditation agencies because they are harder to measure than traditional inputs. Veterinary competencies generally comprise attributes related to knowledge, skills and attitudes, and it is the last component that is most difficult to measure. In practice, accreditation agencies expect that veterinary schools will have a set of competencies for their

graduates and can demonstrate evidence of how these competencies have been achieved by individual students.

Accreditation agencies can play a crucial role in this changing environment, by providing opportunities for veterinary schools, the veterinary profession and the community to review veterinary performance and help plan educational strategies for future needs. The greatest threat to the future development of veterinary accreditation is that it loses the confidence of its major stakeholders by failing to:

- review performance and implement appropriate changes
- be seen as consistent
- be transparent
- have a clear, rigorous process.

Enhancing the international co-ordination of accreditation

On a global scale, each accreditation process needs to ensure the strength of its own system and, ultimately, to work more closely with other systems to achieve equivalent standards that can underpin an international framework of veterinary school accreditation. An international framework could also provide assistance to countries and regions of the world that do not currently have an accreditation system for veterinary education and wish to move in this direction. The benefits of extending an integrated system of veterinary school accreditation might include:

- enhancing the global movement of veterinarians
- encouraging students to seek international options for study
- contributing to equivalent standards of food-animal production
- enhancing global co-operation to reduce the impact of animal diseases, including zoonotic diseases.

Table I
The strengths, weaknesses, opportunities and disadvantages of veterinary school accreditation

Strengths	Weaknesses	Opportunities	Disadvantages
<ul style="list-style-type: none"> - standards are transparent - standards can be set by combined input from the registration authorities, universities, the profession and the community - uniform standards can be maintained within a jurisdiction - there is the ability to compare standards between countries and to facilitate movement of veterinarians - trade partners can have more confidence about standards of animal health in countries with accreditation systems 	<ul style="list-style-type: none"> - can limit innovation in education if requirements are not kept relevant - accreditation can be expensive - there may be limited progress towards mutual recognition of accreditation systems - the lack of accreditation systems in many countries 	<ul style="list-style-type: none"> - can provide a forum for discussing the standards and nature of veterinary education - possible to develop a global system of accreditation 	<ul style="list-style-type: none"> - loss of relevance because of inability to adapt to changing circumstances - lack of support from registration authorities

The need for greater international co-operation among agencies responsible for veterinary school accreditation has been recognised for some time. In 2002, AVMA invited representatives from the RCVS, AVBC and the Canadian Veterinary Medical Association to discuss the process of veterinary school accreditation in each jurisdiction. This productive meeting demonstrated that there was great similarity in the standards and the process of accreditation. All parties were considering the challenge of moving from reliance on input measures to systems that put more emphasis on identifying and assessing the competencies of new graduates. This meeting was followed by a meeting of the same groups plus EAEVE in London in 2004, and included detailed discussions on the accreditation procedures used by each agency. Moreover, representatives exchanged information from people who had acted as observers on visits conducted by other agencies.

This meeting also explored options for developing a more global system of veterinary school accreditation. In May 2007, the AVBC hosted a follow-up meeting in Melbourne and invited representatives from the RCVS, AVMA, EAEVE and the South African Veterinary Council (SAVC) to participate. Each of the participating organisations reviewed developments since the previous meeting. Discussion also focused on their experiences of joint participation in accreditation visits and explored options for undertaking joint visits to veterinary schools that were seeking accreditation from more than one agency.

Progress towards a more global approach to accreditation has been slow. However, a number of activities have been steadily building confidence that the concept is sound. Examples of collaborative activities include:

- a long-standing agreement between the AVBC and RCVS to accept visitation reports from the other party and to have observers on visits
- an agreement between the RCVS and AVMA
- joint RCVS and EAEVE visits to veterinary schools in the UK
- a combined visit of EAEVE, AVBC and AVMA (a preliminary visit) to the veterinary school in Dublin
- a visit organised by the SAVC to the veterinary school in South Africa, which included observers from the AVBC and RCVS
- a concurrent visit of the AVBC and AVMA to assess the veterinary school in New Zealand
- planning for a joint visit of the AVBC, RCVS and AVMA to a veterinary school in Australia in 2009
- the fact that the World Veterinary Association has been considering how to establish minimum standards for the veterinary curriculum and a global accreditation system.

In the visits described above, one of the agencies takes responsibility for organising the visit and the other agencies nominate one or more visitors or observers. In general, the participating agencies may decide to prepare their own report or to share a report. That report is then used to recommend to their own governing body whether or not to accredit the school in question.

Thus far, the discussion has focused on existing accreditation systems in Europe, North America and Australasia. In addition to these, accreditation systems have been developed in Mexico and South America, and are discussed elsewhere in this publication (3, 6). In 2004, a workshop was held in Jordan to explore options for accrediting the 35 veterinary schools in the Arab world.

In global terms, it can be seen that there are a number of western countries that are committed to accrediting veterinary schools and which are working together to ensure that their standards are similar. Moreover, they are making efforts to find mechanisms to facilitate co-operation and, potentially, some degree of mutual recognition. There are also systems of veterinary school accreditation evolving in other parts of the world. Thus, there would seem to be merit in finding a way to foster co-operation between the people responsible for these initiatives. The benefits of co-operation would include:

- sharing experience of the accreditation process
- training for people to deal with evolving systems
- a forum to discuss future developments.

The practice of veterinary science varies greatly in different parts of the world and it is therefore appropriate that accreditation systems are developed to meet the needs of specific regions. The major differences in veterinary education between regions are influenced by the nature of the animal populations and the requirements for veterinary services in the region.

Meetings of the organisations responsible for accreditation in the western world have been very valuable in improving co-operation and discussing future challenges. Taking the next step, and evolving a more global approach to veterinary school accreditation, would be facilitated by the development of an organisational framework that could enhance current arrangements and broaden the scope to include the participation of representatives from other systems and regions interested in implementing accreditation. Such a framework could be a forum for discussing such issues as:

- evolving categories of accreditation
- future challenges in maintaining veterinary educational standards

- facilitating co-operation, particularly with evolving accreditation initiatives
- global veterinary needs.

The development of such a global system is dependent on the good will of the agencies responsible for current accreditation systems and on the availability of an international agency with a mandate to undertake such an initiative. A key element of the role of the World Organisation for Animal Health (OIE) is improving global animal and public health, in all its numerous facets. In

undertaking this review, it is clear that educating veterinarians is part of the core business of this organisation. It may, therefore, be logical for the OIE to consider what role it could play in facilitating opportunities for a more global approach to the accreditation of veterinary schools.



Adapter l'agrément des écoles vétérinaires aux nouveaux besoins mondialisés de la profession et de la société

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Résumé

En Amérique du Nord, au Royaume-Uni et en Australasie, l'agrément des écoles vétérinaires fait partie intégrante du processus d'autorisation de l'exercice de la médecine vétérinaire. Dans ces régions, les autorités d'accréditation compétentes ont mis au point une série de normes qui constituent la base des auto-évaluations réalisées par chaque institution, préalablement à la visite de l'équipe d'évaluation qui dispose d'une semaine pour valider leurs résultats. La mondialisation croissante de la production alimentaire et des mouvements d'animaux s'accompagne d'un risque accru de propagation des maladies animales et d'un renforcement des garanties exigées par les partenaires commerciaux pour préserver les normes de qualité des denrées alimentaires. Ces évolutions, et d'autres encore auxquelles est confronté l'exercice de la médecine vétérinaire, imposent aux écoles vétérinaires de réviser en permanence leurs programmes d'enseignement afin de s'adapter aux exigences concrètes de la profession. Les systèmes d'accréditation des pays occidentaux ont engagé une démarche commune afin d'améliorer leur collaboration et de réviser leurs normes, mais à ce jour il n'existe pas d'agence internationale chargée de faciliter l'amélioration ou la création de nouveaux systèmes. L'auteur estime que l'OIE pourrait envisager de jouer un rôle à cet égard dans le but d'améliorer l'enseignement vétérinaire.

Mots-clés

Agrément – École vétérinaire – Homologation vétérinaire – Norme vétérinaire – Qualité de l'enseignement.



Adecuación entre la homologación de facultades de veterinaria y las necesidades mundiales de la profesión y la sociedad

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Resumen

En Norteamérica, el Reino Unido y Australasia, la homologación de facultades de veterinaria es parte integral del proceso de colegiación de los veterinarios para el ejercicio profesional. En estas regiones, el organismo responsable de las homologaciones define una serie de normas a partir de las cuales cada facultad puede preparar un informe de autoevaluación, que después es validado por un equipo que pasa una semana trabajando 'in situ'. Las tendencias mundiales en materia de producción alimentaria y movimiento de animales incrementan el peligro de diseminación de enfermedades animales y generan una mayor demanda, por parte de cuantos intervienen en transacciones comerciales, de normas para garantizar la calidad de los alimentos. Estas y otras tendencias que influyen en el ejercicio de la medicina veterinaria exigen que las facultades actualicen continuamente sus planes de estudio para adaptarse a las necesidades del mundo profesional. En Occidente, los sistemas de homologación vienen trabajando conjuntamente para mejorar su colaboración y revisar sus normas, aunque por ahora no hay un organismo internacional que se ocupe de propiciar la elaboración de sistemas nuevos y adaptables. El autor sugiere a la OIE que se plantee si tiene una función que cumplir para mejorar la enseñanza de la veterinaria, prestando asistencia en este terreno.

Palabras clave

Calidad de la enseñanza – Facultades de veterinaria – Homologación – Normas veterinarias – Registro veterinario.



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