Veterinary Education in Europe 2009 and beyond

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Veterinarians have a special responsibility both within and for human society i.e. the protection of the health and welfare of both animals and humans. Veterinarians are not only responsible for animal health and welfare but also for monitoring the safety of the whole food chain from feed to food as well as for safeguarding public health in terms of zoonotic diseases. All this shows that veterinarians have a broad field of occupation. An excellent and thorough undergraduate training and the willingness to maintain life-long learning are the bases for a successful undertaking as a veterinarian.

Regulated Profession in the European Union

The importance of the veterinary profession is also shown by the fact that it is one of the seven regulated professions in the European Union. "Regulated" means that specific qualifications are prerequisites for professional activities which are laid down in the "Directive 2005/36/EC of the European Parliament and the Council of 7 September 2005 on the Recognition of Professional Qualifications". This Directive defines in article 38 the minimum requirements for veterinary education as follows:

- (1) The training of veterinary surgeons shall comprise a total of five years of full-time theoretical and practical study at a university ... covering at least the study programme referred to in Annex V, point 5.4.1.
- (2) Annex V, point 5.4.1 details that training as a veterinary surgeon shall provide an assurance that the person in question has acquired the following knowledge and skills:
 - adequate knowledge of the sciences on which the activities of the veterinary surgeon are based;
 - adequate knowledge of the structure and functions of healthy animals, of their husbandry, reproduction and hygiene in general, as well as their feeding, including the technology involved in the manufacture and preservation of foods corresponding to their needs;
 - adequate knowledge of the behaviour and protection of animals;
 - adequate knowledge of the causes, nature, course, effects, diagnosis and treatment of the diseases of animals, whether considered individually or in groups, including a special knowledge of the diseases which may be transmitted to humans;
 - adequate knowledge of preventive medicine;
 - adequate knowledge of the hygiene and technology involved in the production, manufacture and putting into circulation of animal foodstuffs or foodstuffs of animal origin intended for human consumption;
 - adequate knowledge of the laws, regulations and administrative provisions relating to the subjects listed above;
 - adequate clinical and other practical experience under appropriate supervision.

In the above mentioned Annex V, point 5.4.1, all the subjects are listed which should be included in a veterinary study programme and the goal of undergraduate training is specified

as follows: "The distribution of the theoretical and practical training amongst the various groups of subjects shall be balanced and coordinated in such a way that the knowledge and experience may be acquired in a manner which enables veterinary surgeons to perform all their duties." This sentence stipulates omni-competent new graduates.

This Directive 2005/36/EC is the base of the European System of Evaluation of Veterinary Training which is managed by the European Association of Establishments for Veterinary Education (EAEVE) in co-operation with the Federation of Veterinarians of Europe (FVE).

The European Association of Establishments for Veterinary Education (EAEVE)

The EAEVE was founded in Alfort (near Paris) in March 1988. Currently the Association has 98 member establishments responsible for veterinary training in 34 countries, located all over geographic Europe, together with Turkey and Israel (for more information refer to the website: www.eaeve.org). Creating harmonisation amongst establishments for veterinary education in Europe was one of the key issues which necessitated the foundation of EAEVE.

Its objectives are laid down in article 3 of the Statutes (which can be found in full on the website):

"The objective of the Association shall be to maintain and develop the standards of veterinary education in Europe and so ensure that those trained in veterinary medicine meet the requirements of society. The Association shall reinforce, particularly in Europe, co-operation between Establishments for Higher Education in Veterinary Science and other relevant bodies. The Association should also act as a Forum for the discussion of matters for Veterinary Education, in order to improve and harmonize veterinary education among the members. The Association will manage the European System of Evaluation of Veterinary Training, based on the mandate given by the Commission of the European Community (01-02-1994)."

Not all European establishments for veterinary training are members of EAEVE since membership is voluntary. For members, however, a periodic international peer-group evaluation is mandatory.

The European System of Evaluation of Veterinary Training

The objective of the evaluation is to ensure that the veterinary training at all of the EAEVE member establishments fulfils the minimum compulsory requirements for all the EU member states outlined in the relevant Directive 2005/36/EC. The whole procedure of the evaluation is described in the paper "Principles and Process of Evaluation and Manual of Standard Operating Procedures" (see: www.eaeve.org).

In the last 20 years 88 establishments of veterinary education have been evaluated and currently 43 are approved, meaning that they are at least, often far more than, fulfilling the minimum requirements. 17 "vet schools" have been visited and could not be approved because of major weaknesses (called category I deficiencies). A detailed list of the establishments' status is published on the EAEVE website.

The main reasons why schools have not been approved are (Horin, 2007):

- **Poor clinical training**: There are three reasons for this category I deficiency: the number of patients is insufficient in relation to the number of students, the technical equipment of the clinics is out of date and/or not all major domestic animal species are catered for in the clinics;
- **Absence of a mobile clinic**: The veterinary hospital must have a mobile clinic for farm animals so that students can practice veterinary medicine externally and on the farm under expert supervision;
- **Lack of an emergency service:** The veterinary hospital must operate day and night like a normal private practice;
- **No access to a farm:** Most of the students are short on experience with farm animals. Therefore a farm is essential where the students can learn the normal behaviour of farm animals and their safe handling,
- **No access to a slaughterhouse:** Monitoring the whole food chain "from feed to food" is one of the most important duties of the veterinary profession. The students have to see what happens in a slaughterhouse and they need objective teaching and practical exercise.

The major objective of the evaluation is to help the establishments to improve the quality of veterinary training thus making EAEVE almost a guarantor for the quality of veterinary education in Europe. Unfortunately, the system has one major weakness in that its results have no legal consequences. The diplomas awarded by the European veterinary schools have all the same value independent from the status of the establishment.

Thought-provoking Facts

There are some common trends in most of the European veterinary schools (Wanner, 2007) which provoke thought:

- the veterinary profession is becoming practically a career for women. In some Western European countries, up to 90 % of the students are female and the feminisation is still growing;
- there is a decreasing interest in farm animal veterinary medicine, however there is an increasing demand for veterinary experts in food animal production. If the veterinary profession is unable to fill this gap, then other professional groups will spring in;
- there are insufficient numbers of graduates willing to start an academic career, especially in builtrics, swine medicine and animal nutrition. It is also a fact that more and more academic teachers in the veterinary schools are not veterinarians;
- an "urbanization" of the veterinary schools is occurring, with more and more establishments located in cities, with longer distances to agricultural farms, and with fewer farm animals as clinical patients. A corrective of this could be greater emphasis on extramural training under the supervision of the academic veterinary establishment;
- nearly all of the faculties complain about the shortage of money. Some of them try to save money by closing clinics, by reducing the services or by curtailing the budget for research.

Academic Teaching

Academic teaching means a research-based transfer of knowledge, skills and of inquisitiveness. This is also valid for veterinary training, which has to be considered as an academic study, not an apprenticeship. The students learn the basics of veterinary medicine including some manual skills (essential competences, the so called day-one-skills) so that the graduates are able to start working in the different occupational fields of the profession. They are polyvalent, not omni-competent as it is written down in Annex V, point 5.4.1 of the Directive 2005/36/EC.

The teaching of academic veterinary medicine is a challenge because it must anticipate the changing needs of society and of the profession. The veterinary medical education must prepare the graduates, the future veterinarians, for what might come in the future, not just for what can be seen and experienced now (Willis et al., 2007).

Vision

Clinical veterinary medicine has to be the predominant part of veterinary education and is the basis of the public image which veterinarians presently enjoy. Veterinarians are the interface between animals and people and it must be the common goal of the whole profession that this public image remains intact. But do not look into the driving mirror to see the future!

The veterinary profession is split into several specialities and sub-specialities but today's goal of education is the omni-competent graduate. Is this educational goal still realistic against the background of the rapidly growing and permanently increasing knowledge-base? Would it not be better to change the training and to split it in several tracks? The Bologna Process earmarks two main cycles for the study. Why the faculties do not use this chance by introducing a common undergraduate training where really the basics of veterinary science are taught followed by the master cycle with different tracks? The graduates are still veterinarians but with a master degree in pet medicine, in horse medicine, in farm animal medicine, in veterinary public health, in biomedical research for example. A faculty does not offer all the tracks. Each faculty defines its core competences, the teaching hospital is focused on specific clinical areas and the student chooses the faculty which is offering the selected track. The faculties have to work together so that at the national level all the educational tracks are available. This tracking system has some advantages. The teachers can work together with really interested students and the students have a higher individual competence at graduation. It should also be kept in mind that the faculty can also save money by applying this system.

Collaboration between research and teaching is the key for the faculties to improve their excellence.

Literature

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