

FIFTEEN YEARS TEACHING RABBIT HUSBANDRY 1972-1987

F. Lleonart and J.A. Castello

Real Escuela Oficial y Superior de Avicultura

Plana del Paraiso 14. 08350 Arenys de Mar (Barcelona). SPAIN

The "Real Escuela Oficial y Superior de Avicultura", located at Arenys de Mar, near Barcelona, Spain, is a Centre devoted to the teaching of poultry husbandry since its foundation, in 1896. It is the only Centre of this kind in Spain.

From the beginning of the seventies some activities in the rabbit field were undertaken, when the modern rabbit husbandry have not developed in Spain. These activities were the setting of a small rabbitry, the Rabbit Courses and the publications of several books and magazines on this subject.

After several years teaching rabbit husbandry we have changed many things in these Courses as a consequence both from our greater experience on this subject or from the rapid changes occurring in the industry in Spain and all over the world. As in many Courses we have made inquiries among our students, we have known their opinions in order to improve the quality of our programs.

Summarizing our activities in relationship with these Courses, we are going to review the following aspects:

1. Types of Courses and students.
2. Programs conducted from the theoretical side.
3. Practical programs in the Courses.
4. Rabbitries used for education programs and research work.

Types of Courses and students.

Initially, the Rabbit Courses had a general purpose and the program cover a wide range of subjects related with the rabbit husbandry (physiology, nutrition, management, breeding, diseases, etc.).

However, after 1985 the School have organized also some other

Rabbit Courses devoted to specific subjects in order to extend the amount of information supplied to rabbit growers.

Between 1985 and 1987 the School has organized 4 Specialized Rabbit Courses: two related to Breeding, one to Diseases and one to Houses and Equipment. The duration of these Courses has been always 3 days.

Students in these Courses come from a wide range of areas, most of them from the Northern and North East regions of Spain and a good number also from Portugal and several Latin American countries.

Before 1976 there was no limitation on the number of students accepted to these Courses, being the highest figure 42 people in 1973. However, in order to increase efficiency of the practical lessons from 1977 a limitation was settled to 24 students; in this way they can be split in 4 groups of 6 each and this allows to participate better in the practical lessons.

Programs conducted from the theoretical side.

General Rabbit Courses have been organized every year during the months of October or November. Normal length of a Course is one week, from Monday to Friday, but several times a second week has been used.

In a typical one-week Course a total of 32 hours are devoted to lectures, including the practical lessons at the rabbitries of the School. In a 2-weeks Course a total of 56 hours have been spent on theoretical and practical subjects and one full day to visit commercial rabbit farms and industries related.

During the first years a total of 27 subjects were explained but from 1981 they have been reduced to 22 in order to increase the number of practical lessons at the rabbitries and the laboratories.

A main objective of the Course was to deal each subject by the best expert we could find. In this way, besides own Professors from the School, other Veterinarians and Agricultural Experts from the Feed Industry, Laboratories and even rabbit growers have been called to deal specific subjects.

A General rabbit course is explained normally by 6 to 8 people and they deal both theoretical and practical lessons. A total of 26 different collaborators have been explaining these Courses from 1972.

During the first Courses some mimeographed material was given to the students. This was enlarged each year and it was the background to publish in 1980 a comprehensive "Tratado de Avicultura", with 1200 pages, in three volumes. Authors of this text book were the same collaborating in the Course.

The subject studied more detailed in the Course was Hygiene and Diseases, with some 5 or 6 lessons and then Management, with 4 or 5 lessons. Other subjects studied in the Course were Anatomy and Physiology of the Rabbit, Environment and Housing, Genetics and Breeding and Nutrition, each one with 2 lessons. Finally, other subjects are Marketing, Economics of the production, Equipment, etc.

Along the last 15 years the School has produced a very complete set of slides on Rabbit Production and they are used in most lessons, depending on the subject. A TV-video has been settled also recently in order to improve the quality of the Course.

#### Practical program in the Course.

Since the beginning of the Rabbit Course the School settled a small rabbit farm for 24 does. This farm was enlarged twice in order to accomplish the trends in the commercial rabbit farming in Spain and to be used both for experimental and teaching purposes. As more room was available, practical lessons in the rabbitry could be given more comfortably for the students.

These practical lessons are given also in the laboratories of the School; one of them is "converted" during the Course in a slaughtering plant.

From 1982 artificial insemination has been explained in the Course, theoretically and practically. In 1985 a computer program for breeding and monitoring performances in the rabbit farm was also introduced into the Course.

Number of practices conducted by students during the Course are very wide. They are:

- Post mortem for anatomy and diagnostic of diseases.
- Sexing young and old rabbits.
- Mating of breeders.
- Inspection of the health status of breeders.
- Weaning suckling kitlings.
- Preparation of nests.
- Colletion of sperm, checking its quality and A.I.
- Palpation of does for gestation diagnostic.
- Disinfection of nests and other equipment.
- Subcutaneous, intramuscular and intradermic injections.

- Hair burning.
- Killing and dressing commercial rabbits.
- Management of a computer program for the farm.

Total time devoted in the Course for these practices ranges from 6 to 8 hours.

In those Courses longer than one week, a full day has been devoted to visit some rabbit farms and industries related in the area.

#### The rabbitries of the School.

The first rabbitry in the School was built when we start these Courses. It had a capacity for 24 does, 3 bucks and the corresponding suckling and fattening kits. 3 tier cages were used, there was a rake for lucerne hay and nests were wooden type.

A second rabbitry was built a few years later in order to increase capacity to 24 does more. It was a shelter with open sides and it contained 2 tier batteries with a metal nest. Round cages were still used for 3 bucks. An additional flat deck cage for 8 does and one buck was installed in the same place in order to know performances of breeding under the "free mating" system.

Along the years, these units have been used not only for teaching purposes but for research. A lot of nutrition trials have been conducted for feed mills and related industries, as well as assaying new drugs for laboratories, etc. A comparison of a normal nest, unheated, with another one electrically heated was made in the shelter rabbitry.

In 1982 a last enlargement was made in order to improve conditions to run experiments and for comfort of students during their practices. Present rabbitries are:

- A 6 x 35 m house, well insulated, for breeding and suckling kits. There are 200 flat deck cages in two rows and total capacity is 155 does, 18 bucks and the replacement stock. The house is naturally ventilated but there is a pad and fan cooling system to be used in summer.

- A 8.5 x 20 m house, well insulated and with natural ventilation. It is divided in 5 completely separated rooms, each one containing 20 flat deck cages for growing 140 kits from weaning to the market age. Each week a batch of weaning kits is placed in one room and another batch of 2 kilograms liveweight rabbits is sold to the market and this all-in, all out system allows a higher sanitary situation of the farm.

All these facilities, as well as the other resources described above guarantee the quality of the education program of the School and we think that it can be of interest for some countries where rabbit production is still very low.

### SUMMARY

The "Real Escuela Oficial y Superior de Avicultura" at Arenys de Mar (Spain) has imparted several Courses on rabbit production. After fifteen years it has received students from all Spanish provinces, Portugal and several Latin American countries. In many of these courses an inquiry has been made in order to know the opinion of the students on them.

This paper summarizes the teaching changes along fifteen years, the preferences and suggestions of the students, the program of subjects, some statistics on students and where they came from.

In the considered period three different rabbitries have been built. The newest one has a capacity for 150 does and it produces weaning rabbits to be housed in 5 different departments.

As many countries are lacking rabbit production teaching centres - for theory and practice -, we believe that our experience could be of interest for them.

### RESUME

Depuis des années, la "Real Escuela Oficial y Superior de Avicultura" est en train de donner des petits cours de divulgation sur l'élevage de lapins. Ces cours ont été programmés chaque année et il y ont participé des élèves de toutes les régions de l'Espagne, du Portugal et de plusieurs pays de l'Amérique du Sud. On a fait, presque chaque année, des enquêtes parmi les élèves sur l'intérêt du cours et du programme.

Ce résumé montre l'évolution de l'enseignement de la

Pendant ce période, l'Ecole a habilité trois bâtiments pour l'élevage de lapins, dont le dernier a une capacité pour 150 lapines meres, et avec 5 unités indépendants d'engraissement.

En considérant que dans beaucoup de pays la cuniculture manque des centres de formation, pas seulement théorique, mais aussi pratique, nous croyons que l'expérience apportée par notre Ecole pourrait devenir très intéressant pour le développement de la cuniculture.

