



Mr. René Mozo Martín
Veterinary Technical Manager
Magapor S.L.

THE VETERINARY DEPARTMENT ADVISES: EJACULATE EVALUATION (Vol.3)

In this third issue on ejaculate evaluation, the Veterinary Technical Dept. of Magapor shows us how to calculate the spermatic concentration in seminal doses thanks to two different methods used to count them.

Concentration calculation:

The two most commonly used methods to make this calculation are the photometer (e.g. Magacell colorimeter) and the counting chamber (e.g. Bürker). The first of the two is quite accurate, it provides speed and homogeneity to the measurements. On the other hand, the Bürker chamber offers greater precision, although the process is more laborious and the variability percentage is greater from one count to another.

Recommendations for counting in Bürker chamber

- Use the right materials and make sure that they are in good conditions as great precision is required.
- Before taking any volume either of ejaculate to prepare the 1/100 solution or of this solution to calculate in the counting chamber, good homogenisation is essential.
- Wait until the spermatozoids remain immobile before starting the count and be rigorous with the methodology used during the counting process(count both in the upper grid and in the lower grid and take the average). If the difference between the two is large (>15%) it is preferable to repeat the process.

For counting with colorimeter

- The materials must be adequate and the apparatus in good conditions and well-calibrated.
- Always use the same solution as for the 1:10 dilution as blank (solution to calibrate the colorimeter).
- The process must be meticulous and rigorous with the volumes, the homogenisation of ejaculates and dilutions (1:10) and the execution of the measurements. To homogenise the content of the cuvette, it is not advisable to stir it, just turn it over two or three times and place it in the colorimeter. Let it stabilise for 10 seconds and then make the measurement.
- It is advisable to use a Bürker chamber with the colorimeter to make routine checks of the measurements of the colorimeter.



Following these concepts will help obtain a good ejaculate evaluation.

Magapor®