Altrenogest: veterinary medicinal products to be used with caution

ANSES-ANMV is reiterating the important precautions for use for medicinal products containing altrenogest. These can cause adverse reactions in humans due to their hormonal action. Therefore, women who are or may become pregnant, and people with known or suspected progesterone-dependent tumours or thromboembolic disorders, should not administer these products themselves. As for other users, they must wear protective clothing that covers the body and use undamaged single-use vinyl, neoprene or nitrile gloves to avoid any contact with the skin.

Altrenogest is a synthetic progestin, available on veterinary prescription as a drinkable solution to manage oestrus ("heat") in horses and pigs.

In the equine sector, this synthetic hormone is found in REGUMATE EQUINE®, a medicinal product widely used both by professional horse breeders, to prevent or synchronise the oestrus cycle in mares, and by horse riders to reduce oestrus symptoms during equestrian competitions. In France, as many as 30,000 treatments containing this drug are administered to mares each year.

In the swine sector, several medicinal products containing altrenogest are authorised in France: REGUMATE®, ALTRESYN®, VIRBAGEST® and SYNCHROPLAN®. Over 80% of French farms use them to synchronise the oestrus cycle in newly introduced gilts (young sows). This means that on average, almost 320,000 sows are treated with these products every year.

Possible adverse reactions in users

Like all synthetic progestins, altrenogest can cause adverse reactions in the persons who regularly administer the treatment to animals. Repeated contact with the product may lead to the following symptoms, as listed in the package leaflets of authorised products and notified via reporting systems:

· **In women**: risk of interruption or disruption of the menstrual cycle, uterine or abdominal cramping, increased or reduced uterine bleeding, and prolongation of pregnancy where relevant;

· **In men**: loss of libido;

· **In both sexes**: less specific signs such as headaches, fever, abdominal pain, nausea, diarrhoea, vomiting and hives.

A report by the United States Food and Drug Administration (FDA), dating from July 2018, mentioned 130 cases of altrenogest-induced adverse reactions occurring between October 1987 and May 2018. In France, there have been fewer reports of adverse reactions in humans: since 2002, only eight cases, of which five were in the swine sector and three in the equine sector, have been recorded in the ANSES-ANMV veterinary pharmacovigilance database or by poison control centres or the Central Fund for the Agricultural Mutual Insurance Scheme, although this does not mean that the risk is lower.

Regardless of the country in question, the number of cases is probably under-reported. The symptoms are often non-specific and the role of the veterinary medicinal product is therefore seldom suspected. Thus, people do not spontaneously make the link between their symptoms and the fact that they have been exposed to the drug.

Precautions for use to be observed

The precautions for use stated in the package leaflets of altrenogest-containing products should be carefully observed. **For example, women who are or may become pregnant should not administer the product.**

Moreover, these medicinal products should not be handled by people with known or suspected progesterone-dependent tumours (breast or uterine cancer) or thromboembolic disorders.

The skin is the main route of exposure to the product. Therefore, any **direct** contact with the skin should be avoided, especially in pregnant women and those of childbearing age. Users should therefore wear **protective clothing** (gloves and clothes that cover the body) when handling the product.

Special attention should be paid to the choice of gloves. The product can pass through porous gloves such as latex gloves. In this case, the risk of transcutaneous absorption is much higher because the skin is covered by an occlusive material promoting the product's penetration. It is therefore advisable to use **undamaged single-use vinyl, neoprene or nitrile gloves** to avoid contaminating the skin when reusing gloves that have already been soiled by the product.

If the product is accidentally spilled, the skin should be washed immediately with clean water and soap. If the product accidentally comes into contact with the eyes, they must be rinsed.

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Where should reports be made?
To report an adverse effect **in humans** following the use of a veterinary drug:
https://signalement.social-sante.gouv.fr

TO FIND OUT MORE :

Meg-Anne Moriceau, Jennifer Blondeau, Élodie Adamczyk, Stéphane Queffélec - La perméthrine – Le point vétérinaire - Mars 2018 / N° 383