

DOSAGE FORMS APPLIED TO BODY CAVITY IN VETERINARY MEDICINE

BODY CAVITY

1. Rectal
2. Vaginal
3. Otic
4. Intranasal

Rectal Route

This route is infrequently used in veterinary practice for any other purpose than local action on the rectum and lower colon.

Glucose, digested proteins, and anesthetics are occasionally administered by high colonic irrigation to obtain systemic effect.

Vaginal Route

Vaginal tablets are pear-shaped and prepared by granulation and compression.

They can be formulated to exhibit two types of release mechanism:

First, a slow-release dissolution which retains the table's original shape. This tablet is similar to a lozenge in structure and is ideal for drugs requiring low concentrations in the cavity for long periods.

Second, effervescent and disintegrating tablets release drug quickly and ensure rapid distribution of the active drug for total local effect throughout the cavity.

Vaginal Route

Intravaginal delivery of reproductive hormones has been used as a means to conveniently administer and easily remove the formulation and thereby synchronize estrus.

Intravaginal and intrauterine irrigations are frequently used in cows as antiseptic infusions, and occasionally as irritants to stimulate uterine activity.

Otic

Otic dosage forms are intended for administration either on the outer ear or into the auditory canal.

They include a number of dosage forms: solutions, suspensions, ointments, otic cones, and powders.

Their primary use is either to remove ear wax or supply local drug delivery.

The type of formulation and its intended use are extremely important.

Intranasal Route

Inhalation of drugs often results in onset of action comparable to administration by intravenous injection while avoiding many of the potential problems associated with intravenous administration.

Intranasal Route

Vaccines and drugs can be administered intranasally as solutions or powders to one or a number of animals sequentially or simultaneously.

The effectiveness of action depends on both the formulation and the method of delivery. Spray and mist dispensers may be used for mass inoculation.