Trihex

For Veterinary Use Only

COMPOSITION:

Each kg contains:	
Tylosin Tartrate	100gm
Doxycycline HCl	200gm
Colistin Sulphate	500MIU
Bromhexine as HCI	5gm

INDICATION:

TRIHEX POWDER is effective against infections caused by Tylosin, Doxycycline and Colistine sensitive microorganisms in calves and poultry especially for gastrointestinal and mycoplasmal infections. In poultry mainly of the respiratory tract infections, it is often used during bronchopneumonia in cattle.

PHARMACODYNAMICS:

Tylosin is a macrolide antibiotic, which is effective against Gram-positive bacteria like Staphylococcus, Streptococcus, Actinomyces, Clostridium, Micrococcus and Gram-negative bacteria like Pasteurella, Moraxella, Haemophilus, Bordetella, Escherichia coli, Salmonella and Mycoplasma species. At recommended doses, tylosin acts as bacteriostatic antibiotic. Tylosin inhibits the protein synthesis of susceptible microorganism by binding to 50-S subunit of ribosomes.

Chromosomal mutation to resistance may develop rather fast for tylosin, although such resistance is relatively unstable. Extra-chromosomal plasmide mediated resistance against macrolide antibiotics also occurs.

Doxycycline is a new-generation, semisynthetic tetracycline derivative antibiotic which have a broad spectrum activity against Gram-positive and Gram-negative bacteria like Chlamidia, Rickettsia, Salmonella, Pasteurella, Clostridium, Haemophilus, Mycoplasma and Spirochetes spp. It induces mainly bacteriostatic effect by inducing protein synthesis in the bacterial cell.

Colistin (polymyxin E) is a polymixin antibiotic produced by certain strains of Bacillus polymyxa var colistinus. The primary antibacterial effect of colistin is a blockage of the cell division of bacteria followed by secondary progressive lysis. Colistin is effective against most gramnegative bacilli.

Bromohexine liquefies the bronchial secretions and alleviates the expectoration of sputum thus facilitates respiration.

PHARMACOKINETICS:

Tylosin reaches maximal blood levels between 1 and 3 hours after an oral dose. Minimal or no blood levels remain 24 hours after an oral dose. After oral doses were given to pigs, tylosin was found in all tissues, between 30 minutes and two hours after administration, except for the brain and spinal cord.

It has been shown that most of the material which is excreted is to be found in the faeces and consists of tylosin (factor A), r e l o m y c i n (f a c t o r D) a n d dihydrodesmycosin.

Doxycycline is bio-available after oral administration. When orally administered, it reaches values greater than 70% in most species. In fasting conditions bioavailability is around 10-15% greater than when the animal is fed. Doxycycline is well distributed through the body as it is highly lipid soluble. It reaches well irrigated tissues as well as peripheral ones. It accumulates in liver, kidney, bones and intestine; enterohepatic recycling occurs. In lungs it always reaches higher concentrations than in plasma. Therapeutic concentrations have been detected in aqueous humour, myocardium, reproductive tissues, brain and mammary gland. Plasma protein binding is 90-92%. 40% of drug is metabolized and largely excreted through faeces (biliary and intestinal route), mainly as microbiologically inactive conjugates.

Colistin does not permeate through the intestinal mucous membrane. Following oral administration it remains in the digestive tract and is eliminated in excrements. If high doses are used, a small amount is eliminated in urine, too. The polypeptide structure of colistin prevents it from being absorbed in the digestive system.

Bromohexine is quickly absorbed after oral administration and maximum concentration is found in respiratory tissues where it stimulates mucus glands.

DOSAGE AND ADMINISTRATION:

Administer the following dose orally: **Poultry:** 1g per 2 liters of drinking water for 3-5 days

Calves: 100g per 80 calves of 50Kg body weight daily during 3-5 days

CONTRAINDICATIONS:

Do not use in animals sensitive to any ingredient of the product. Do not use in laying birds. Do not use in animals with renal or hepatic disorders.

Imore Manufactured by:

Pharmaceuticals (Pvt) Ltd. Selmore Pharmaceuticals (Pvt) Ltd. 36 Km Multan Road, Lahore, Pakistan,

PRECAUTIONS:

- Always close tightly the sachet or jar after initial use to protect the powder from taking moisture.
- Calculate the weight of animals accurately for effective medication.
- This product is only for oral use.

STORAGE:

- Store between 15- 25°C in a cool and dry place.
- Keep out of the reach of the children.
- Consult the veterinarian before use.

Selmore's Specs.



