

# Sheep Pox and Goat Pox

## Etiology :

- SPV the causative Capri pox virus affected only sheep.
- SGP V. highly contagious pox infect to sheep and goat and it also Capri pox V.
- - family poxviridae .
- -The diseases produced by sheeppox and goatpox viruses are collectively called capripox infections.

## Epidemiology :

- Sheep pox highly contagious ,spreading occur by contact with infected animals and contaminated articles .
  - By inhalation .
  - Capri pox has been spread via stomoxy calcitrance .
  - Goat pox virus afford solid immunity in sheep against both goat pox and sheep pox but sheep pox vaccine does not protect goat against goat pox .
  - Mortality rate is low 5%, sever losses may occur if the udder is affected due to secondary mastitis .
- The virus is present in **nasal and oral secretions for several weeks** after infection and can **live in scabs that have fallen off the animal for several months**.

## Pathogenesis :

- viremia , virus deposited in most tissue include the skin ,the V. present in greatest quantities between ( 7 th and 14<sup>th</sup> days) ,after inoculation.

- viremia ,Erythema ,Firmraised papules light in color with zone of hyperemia around base ,
- Vesiculation,a yellow blister with apitted center.
- Pustular stage followed by development of a thick ,red ,tenacious scab.

### **Clinical signs :**

- Incubation period 2-14 days .
- In lamb malignant form common type ,depression ,fever, discharge from the eye and nose ,affected lamb may die in this stage befor typical pox lesion develop. ,
- There is papules ,then become nodular ,vesicular,pustular and finally scabs
- Some of them progress from nodules to tumor-like masses
- Skin lesion reappear on unwoolled skin and on the buccal respiratory, digestive and urogenital tract mucosae.
- mortality rate in this form 50%
- Beningn form:
- In adult only skin lesion under the tail and no systemic reaction
- Goat pox in sheep is more sever than sheep pox and lesion occur on lips and oral mucosa ,the teats and udder.
- Goat pox in goat is similar clinically to sheep pox ,mobidity rate 90% and mortality of 40%.

### **Clinical Pathology :**

- virus culture in tissue culture
- serological test .

### **Necropsy Finding :**

- in malignant form pox lesion extend to mouth, pharynx ,laeynx and vagina

Catarrhal pneumonia

**Differential Diagnosis :**

- 1- Blue tongue
- 2- Contagious ecthyma .

**Treatment :**

No specific treatment .

**Control:**

- **Destruction** of affected animal .
- Quarantine.
- Vaccination ,killed vaccine ,live attenuated .