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Popular Article

Importance of Prevention of Foot and Mouth Disease of Livestock

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Introduction:

Disease occurrence can only be prevented if we keep our knowledge about them updated i.e. how disease is caused, how it is spread among animals, what are the signs from which disease can be identified, how it can be prevented and controlled. Therefore, farmers should do every effort to gain knowledge which can affect their profitability. Among various diseases, FMD is considered to be the most important disease which affects all livestock species such as cattle, buffalo, sheep, goat and pigs. The disease often causes fever, excessive salivation and lameness in an infected cattle followed by painful blisters on the animal's tongue, nostrils, lips, mouth, hooves and udder. In INDIA, types O, A, C and Asia-I strains are prevalent. In PUNJAB, type O and Asia-I are prevalent. Virus is more severe on exotic as well as crossbred dairy cattle, commonly affecting animals in winter season. It causes huge economic loss to the dairy, sheep and goat and pigs.

Direct Loss:

- Reduced milk production, meat production or death of animals.
- Reduced growth.
- Loss through decrease in fertility of affected animals leading to abortions, delayed conception or repeat breeding.
- Chronic mastitis or lameness.

Indirect Loss:

- Cost incurred in treatment of affected animals.
- Cost of disease control.
- Market opportunities lost local as well as international.

Spread:

This virus spreads from animal to animal through direct contact i.e. nose-to-nose touching, aerosols

in the breath and saliva. It is also spread by contact with contaminated objects and materials such as feed, fodder, straw and water. Calves can get infection from their mothers. FMD can easily be spread from farm to farm by people.

Symptoms:

- Infected animals develop lesions on their mouth and feet.
- Clearest signs are excessive salivation, appetite loss and lameness.
- Rise in body temperature (104°F)
- After fever, there is development of blisters in the mouth or on the other parts such as nostrils, udder and feet.
- Lesions on the mammary gland develop secondary infections, resulting in mastitis.
- Animals are unable to eat properly because of the pain and go off feed, resulting in weight loss.
- Sharp decrease in milk production.
- Young calves may develop lesions in heart and die without showing any signs.

Prevention And Control:

In case of disease occurrence, immediate action should be reporting to the nearest veterinary hospital so that treatment is started as early as possible. Washing of mouth ulcers and lesions on feet with Potassium Permanganate (KMnO₄) solution in water in the ratio of 1:1000 is recommended. Boroglycerine can be applied on ulcers in mouth. Within the herd, disease spread is prevented by avoiding direct contact of healthy animals with infected animals. Infected animals are quarantined.

Regular vaccination helps to develop immunity of the animals against the disease. Organized livestock farms can be provided with foot bath containing disinfectant solutions such as phenyl, potassium permanganate etc. at the entrance gate so as to prevent entry of the virus through vehicles or people into the farm.