

Lice Infestation

Hematopinus suis is a species of lice that are cigar-shaped, tiny insects. Lice can be seen with the naked eye, that are 2-3 mm in length. Their primary effect on the pig is blood loss in cases of heavy infestation, but lice may also carry a bacteria, *Eperythozoon suis* which causes anemia. Survival off of the pig is limited to only a few days under humid conditions and moderate temperatures

Clinical Signs

- Lice tend to cause redness and itching
- Can be found primarily on the stomach, head, and folds of the jowls and neck
- Lice may also infest the ear.



Diagnosis

Close inspection of an affected pig under conditions of good lighting usually reveals the lice on the skin surface.

Treatment, prevention and control

Treatment of all pigs on the premises, on the same day, with ivermectin or doramectin is necessary to get rid of lice from an infested herd. Repeat treatments every one to two weeks for three treatments, depending on the particular product instructions. Prevention of lice infestation is very similar to prevention of sarcoptic mange.

Parakeratosis

Parakeratosis is a skin disorder that is a dietary deficiency of the mineral **zinc** and is seen in pigs older than 2 months. Pigs raised indoors are prone to zinc deficiency because they do not root and eat small amounts of soil to obtain some zinc. Soybeans contain high levels of **phytic acid**, a compound that interferes with absorption of zinc in the pig's intestine. High levels of dietary calcium can also decrease zinc absorption.

Clinical Signs

- **Poor growth rate** is an early sign of zinc deficiency, usually occurring before skin lesions
- With time, red, raised areas appear on the skin of the stomach and lower legs.
- These soon change and form into **thick**, dark-colored, **scales and crusts** that spread to cover most of the skin of the body.
- Deep clefts may develop, and bacterial infection is common.
- Mild, intermittent itching may develop as a result of secondary bacterial infection.

Diagnosis

Testing zinc levels in the blood can be used to confirm this disease in the live pig. Examination of skin biopsy specimens is also helpful. In dead pigs, liver concentrations of zinc can be measured, and your veterinarian can search for the expected changes in the esophagus.



Prevention requires periodic measurement of dietary mineral content, as well as occasional testing of serum or liver zinc concentrations.

Erysipelas (Diamond Skin Disease)

Erysipelas is caused by a type of bacteria called *Erysipelothrix rhusiopathiae*. Many organs in the pig's body can be involved in the disease; the most obvious sign is the skin problems. The organism is typically spread by pigs that are infected but do not show signs. However, contaminated feed and water, as well as infected birds, pets, and other livestock can also spread the disease to herds. Pigs with obvious signs of this disease can shed large numbers of the organism in feces and bodily fluids.

Clinical Signs

- Fever (103 to 106° F)
- Pigs are reluctant to stand, they may squeal while attempting to rise and rapidly return to lying down.
- Red diamond-shaped patches of skin on the face and abdomen will occur. With time, these patches and the tips of the ears or tail that are involved may begin to fall off.
- Sudden death in pigs of any age may occur



Treatment

Many antibiotics can be used to treat this disease, but treatment often fails in pigs showing signs, and these pigs often will die. Therefore, prevention of erysipelas is important.

Prevention

Vaccination is an effective way to prevent this disease. Initially, two doses of the vaccine are usually necessary to give pigs good immunity. After that, an annual booster vaccination is necessary to keep the immunity solid. Work with your veterinarian to create a vaccination schedule.

Pig's are subjected to many skin problems that can be due to external parasites, bacteria and even nutritional problems. With the following information you can help your veterinarian with descriptions of clinical signs and they can create a program to decrease skin problems in your herd.

Sarcoptic Mange

This disease is caused by a microscopic insect, a mange mite, called *Sarcoptes scabiei* var *suis*. Mites live primarily on the pig and spread by direct contact between pigs. They can survive in the environment for 12 days. The adult mites burrow into the deeper layers of the pigs skin to lay their eggs. The primary economic impact of mite infestation is reduced rate of gain.

Clinical Signs

- Frequent rubbing and scratching
- Large patches of thick, scaly skin develop around the ears, head, stomach, and body
- Hair loss over the rump, stomach and neck.



Diagnosis

Deep skin scraping of multiple sites are often needed to find a single mite.

Treatment, Prevention and Control

Treatment of all pigs on the premises, on the same day with ivermectin or doramectin is necessary to get rid of mange from an infested herd. Repeated treatment is necessary because mites in the egg stage at the time of initial treatment will not be affected by medication. Also, repeated treatment will get mites living in the environment when they return to the pig between treatments. **To prevent introduction of the mite into your herd, treatment and isolate new purchase and show animals for at least 3 weeks.**



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Skin Problems in Swine

