



DISEASES

As with all livestock, there is always some risk of disease that may or may not be passed on to the farmer. Proper sanitation and hygiene should prevent most diseases from being passed on to humans. Contact your county agent or local vet for information in setting up universal safety precautions for your farm. Whenever you have to move or disposing of birds with any disease, it is always best to wear rubber gloves and eye/face protection to avoid contact between any blood or diarrhea and the mucous membranes.

The body temperature for emu ranges between 100.°F to 103°F. The easiest way to measure the body temperature is by using an instant-readout digital ear thermometer. Anything above 105°F is cause for concern.

This is a list of diseases which your emu could get (depending on where in the country you are located) but should not be considered a complete list. For more information on these and/or other diseases, contact your local vet.

Aspergillosis A fungus that affects the lungs of the bird. Transmission is through moldy hay or straw used in bedding. signs include difficulty breathing but without the nasal discharge seen in other diseases. Treatment is with an anti-fungal drug and prevention is via clean bedding and well ventilated barns in the north.

Avian Influenza This disease will shut down your farm, along with the rest of the state. Symptoms vary but could include:

- Soft-shelled eggs
- Depression and droopiness
- Loss of appetite
- Edema and swelling of head, eyelids, comb, wattles, and hocks
- Blood-tinged discharge from nostrils
- Un-coordination, including loss of ability to walk and stand
- Pin-point hemorrhages (most easily seen on the feet and shanks)
- Respiratory distress
- Increased death losses in a flock
- Sudden death
- Nasal discharges

In the event your flock is infected with Avian Influenza, the state will instruct you on what to do to disinfect your farm. Be prepared for the flock being put down. If this happens, the government will reimburse you for the value of the birds and eggs - this is where good record keeping comes in handy. The American Emu Association is a good resource for help in this situation.

Avian Tuberculosis The only known case of tuberculosis in emus was caused by *Mycobacterium avium* (complex). Humans are more commonly infected with *M. tuberculosis* and occasionally *M. bovis*. It is generally believed that immunocompetent humans are resistant to the strains of tuberculosis found in birds, but that immunocompromised people - such as the elderly, those on chemotherapy, those infected with HIV, those on chemotherapy, and children may be at risk. Avian tuberculosis is transmitted by ingestion and inhalation of infectious organisms from feces. Incubation can vary from weeks to months. If tuberculosis is diagnosed, the bird should be put down and the rest of the flock tested as well.

People who are infected with human tuberculosis should not own birds, since these people may serve as a source of infection for the livestock.

Chlamydiosis or Psittacosis Signs of this disease in humans are similar to that of the flu (headache, muscle aches, fever and cough). It causes respiratory and intestinal disease in the birds. They can die. Contacting the disease usually occurs through inhalation when cleaning infected areas.

Eastern Equine Encephalitis (EEE) & Western Equine Encephalitis (WEE) Carried by mosquitoes, these diseases horrify me - 30 to 50% of the people who catch it die. In the worse cases, the survivors have brain damage which progresses over a period of years until the total care patient dies. Thankfully, we have not had a case of EEE in Tennessee in over 70 years. Vaccination is available, but it is my understanding that this does not prevent the emu from getting EEE (or WEE), only from displaying signs of infection and dying from it. Symptoms are sudden and acute. Bloody diarrhea is followed by extreme debilitation and then death, sometimes within the day. The virus can be "shed" in feces, blood or vomit. Humans can pick up this disease through contact with the virus through mucous membranes and/or open wounds.

Dosage for emu 4 weeks old and older: a series of three shots given one month apart for the initial series -1 full equine dose (1 ml) in the muscle each time. Annual boosting is fine northern climates but here in TN we boost twice a year. Use only the EEE or EEE/WEE vaccine. Do NOT use any vaccine containing Equine Influenza because the birds produce antibodies to Flu and will test positive for **Avian Influenza**.

Erysipelas (Cellulitis) A skin infection caused by bacterial infection that gain access through a cut or sore. Untreated, it could result in blood poisoning. Emus that recover from the disease can become carriers. Humans catch this disease through contact with contaminated soil, blood or feces.

Salmonella Signs of salmonella in humans is similar to that of food poisoning. Emus appearing perfectly healthy. Human infection occurs from (1) handling infected birds or cleaning infected premises without utilizing safety precautions or (2) eating contaminated meat. The meat can become contaminated at time of slaughter if there is fecal contamination or if the emu is so ill that the organism has already infected the blood and it is spread throughout the body.

West Nile Disease West Nile Virus is a vector-borne (mosquito) Flavivirus. There is no 'cure' or treatment for the disease, your autoimmune system must develop antibodies to deal with it. Birds

that are infected are carriers for 4 days. By that time they are either very ill, dead or their autoimmune system has developed antibodies to deal with it. There have been cases of infected emus before. There is no reason for infected birds to be put down.

Horses appear to be more sensitive to the virus than most other species and may or may not develop encephalitis. There is a vaccine available for horses. This same vaccine may be administered to emu, but it is my understanding that you cut the dosage in half, unlike the EEE dosage.

Humans with a suppressed immune system are at risk and may develop encephalitis; however, most people will experience no symptoms or only mild illness.