



What YOU can do to keep wildlife safe.

Recognizing the symptoms of lead poisoning

by Margaret Smith, Executive Director, The Trumpeter Swan Society

The gray-feathered cygnet swan couldn't stand on the river's ice. It was sick and isolated from other swans. It couldn't swallow, or lift its wings to fly. Just a few weeks earlier, as it was feeding in the cold shallow waters of a river, it was scooping up grit and swallowed a lead fishing sinker on the river's bottom, lost by an angler in the river a season or two before. The young swan's gizzard began grinding down the lead into small particles. First the lead was absorbed into the swan's bloodstream. Then lead began to accumulate in the cygnet's internal organs, muscles, and bones. The 9 month old cygnet began its slow journey to death.

The cygnet used its slack, weakened wings to drag itself to open water. When it was captured by a group of volunteers, it weighed about 10 pounds, less than half its normal weight. The young swan was taken to a wildlife rehabilitation center where the sinker was removed and the cygnet began chelation therapy to remove the lead from its bloodstream. The cygnet died 10 days later from lead poisoning. Often by the time swans are weak enough to capture, the lead has spread its toxins through the body's neurological and muscular systems beyond the point where the bird can be saved.

Lead is a known toxin to wildlife and humans. Fishing tackle lost in rivers, lakes and other waterbodies does not dissolve but remains for decades in the sediment. Waterfowl eat submerged vegetation and pick up grit and lead sinkers and jigs in the sediment where they feed.

By switching to nontoxic fishing tackle, you can save wildlife from dying a prolonged and needless death. It is estimated that at least 25 species of birds experience lead poisoning, including swans, loons, and eagles. A single split shot or sinker can kill a 30 pound swan through lead poisoning. Swans pick up lead sinkers and jigs as they eat vegetation and swallow grit. Loons dive for fish and pick up sinkers and jigs through the fish they eat or in the gravel they ingest as grit from the bottom of lakes and rivers. Eagles ingest lead through the fish they eat, or in the carcasses of animals they eat that were shot with lead, or dead birds they eat, such as swans.

"I grew up on the banks of the St. Croix River and fished it for over 50 years. I can't even estimate how many jigs my friends and I left on the river bottom but we sure kept our dads busy pouring and tying new jigs," says Barry Wallace of Wisconsin.

"In the late 80's and early 90's newly introduced Trumpeter Swans began showing up in the open water area behind my house to spend the winter. I soon started noticing swans that weren't acting right. I was able to catch them and transport them to rehab centers where they were diagnosed with lead poisoning from ingesting lead jig heads and sinkers."

"For the next 25 years I documented over 100 dead or sick swans in the river near my house - most I captured and took to rehab, but only a few survived. I know there were many more that I didn't see that were in hidden areas of the channel and died unseen and unknown."

"Sportsmen have always been at the forefront of conservation issues and should be on lead also. Nontoxic alternatives are readily available online and nontoxic split shot is available almost anywhere. One size larger split shot really doesn't make much difference performance wise. We can't do anything about the tons of lead already out there in our rivers and lakes but it's not hard to stop putting more in."

What does lead poisoning look like and what does it do to a bird?

Some of the symptoms of lead poisoning (see photos beginning on page 3)

- ⇒ Isolation from other swans [note: sick animals often isolate themselves]
- ⇒ Muscle weakness and paralysis
- ⇒ Starvation
- ⇒ “Gasping” for air
- ⇒ Tremors
- ⇒ Head shaking
- ⇒ Vomiting green bile, or green feces staining at the vent area
- ⇒ Impacted crop
- ⇒ A reduced ability to regulate its body temperature, causing it to freeze to ice in winter in cold regions

What can YOU do? It’s an easy fix. Whether you fish, or know someone who does, you can keep wildlife safe by these easy actions:

Switch to non-toxic fishing tackle. With little to no cost difference to you in either performance or price, you will know that you are not causing preventable suffering to wildlife. [Download our list of non-toxic tackle suppliers](#)

When you [purchase a “Keep Wildlife Safe” car decal](#) (shown below) through The Trumpeter Swan Society, you will also receive a free list of online suppliers of nontoxic fishing tackle.

Here are more ideas from Mike Browne, who earned his Eagle Scout Award in Massachusetts through his project to make fishermen aware of what lead poisoning does to wildlife and to get fishermen to switch to non-toxic fishing tackle:

Ask your fishing gear retailer to stock non-lead fishing weights. Buy them! It’s worth the investment. Safer alternatives include nickel alloy, bismuth, and tin. Other materials include ceramic, densified plastic, pewter, and stainless steel.

Tell other fisherman about the dangers of lead and the suffering it causes wildlife. Tell them about the loons, eagles, swans, and other waterfowl and raptors who can be killed by swallowing a single lead weight.

Recycle your old lead weights. Don’t just throw your old lead weights away. Dispose of them properly at a hazardous waste collection site, or call a local metals recycler who can dispose of them properly.

After you try non toxic tackle, let me know what your fishing experience is like using it. Email me at tss@trumpeterswansociety.org. Thank you!



Keep Wildlife Safe

Please use non-toxic fishing tackle



TrumpeterSwanSociety.org

**LEAD
KILLS**



Please use non-toxic fishing tackle

TrumpeterSwanSociety.org

You can purchase your 4”x4” adhesive, waterproof decal through our [Gift Shop](#). Perfect for your car, truck, boat, canoe, kayak, fishing tackle box and laptop cover!

www.trumpeterswansociety.org > *How to Help* > *Gift Shop*. \$4, free shipping in USA.

Recognizing symptoms of lead poisoning

(Note: these symptoms may be related to other swan health issues as well)



Above. A healthy swan in full wing display.
Photo by Richard Sonnen



Above: The lead-poisoned cygnet described in the story, starving, unable to use its wings to walk or fly. The cygnet had swallowed a lead sinker as grit.



Above: The cygnet was rescued by volunteers and taken to a wildlife rehabilitation center where it died 10 days later of lead poisoning caused by a lead fishing sinker.



Symptom: Isolation from other swans. Sick animals tend to isolate themselves. Note the drooping wings of the circled swan. Lead weakens muscles.



Symptom: As muscles weaken, flying becomes more and more difficult and finally impossible. The woman in the photo stayed with the swan until it died on the ice a short time later. Photo by Jerry Hogeboom.



Symptom: The swan repeatedly “gasps” for air. Holding its head up becomes more and more difficult as muscles weaken.



Symptom: Starvation and emaciation. Lead paralyzes the smooth muscles of the digestive system. Food becomes impacted in the crop and is not digested. This swan was lucky and recovered. She was released weeks later into the wild. Photo by Centre Wildlife Care, Lemont, PA.

Recognizing symptoms of lead poisoning (cont.)

(Note: these symptoms may be related to other swan health issues as well)



Symptom: Vomiting green bile, and green diarrhea with green feces staining of the vent area (not shown in this photo). Photo by Tammy Wolfe



Symptom: Neurological damage which may be characterized by head shaking, scraping its head on ice, etc. Photo by Tammy Wolfe.



Symptom: (Left) Lead reduces the ability of animals to regulate body temperature. Here a Wisconsin yellow collared swan chips away at ice to free a cygnet that had frozen to it. This is the cygnet, featured in the story, that was rescued four days later and taken to a wildlife rehabilitation center. (Below) Radiogram from the Wildlife Rehabilitation Center of Minnesota shows the lead sinker in the lower left of the swan's body.



Left. **Lead moves up the food chain.** In the distance a group of Bald Eagles feed on a cygnet that had been frozen on the ice for a few days and died.



All photos, except where noted, by Margaret Smith