Ask A Vet: Canker - A Stubborn Foot Problem

Sunday, September 22, 2013

Dear Dr. Weldy's,

Recently, I thought I would pick out my horse's hooves as I had neglected to for some time. I was surprised to find a circle of soft, gray tissue growing near the heel of a hind foot. He is not lame and I would like to know if it is something to be worried about.

Dear Reader,

What you describe sounds a lot like a condition called canker. Canker is commonly thought to be caused by an anaerobic bacterium (grows in the absence of oxygen) in the horn producing tissues of the hoof. This infection causes the overgrowth of keratin or horn tissue of the hoof. This excessive proliferation spreads underneath the horn. Usually, horses have a moist, white or gray matter that appears in the sulci of the frog (the grooves along the softer central part of the sole of the foot). It is sometimes explained as having a cauliflower appearance with cottage cheese like exudates. It can also become diffuse and invade the bars, sole and hoof wall. One foot is commonly affected, but multiple feet can be involved. Hindlimbs are more common than forelimbs. Horses with canker in the early stages are not painful, but once the infection invades the deeper structures of the foot, lameness becomes evident. Stabling that is wet or stalls that are not cleaned on a regular basis are often blamed as the cause. However, many cases have been observed in horses turned out regularly with excellent hoof care.

Since canker originates in the frog, it can be mistaken for thrush. Thrush is limited to the sides (sulci) or perhaps the base of the frog if a fissure is present. Canker can invade any part of the frog although the sulci are the most common area. In addition, canker is a proliferation of tissue whereas thrush is a condition where frog is lost or sloughed. Early canker will bleed easily and eventually develops the characteristic white to gray cauliflower appearance. Many approaches to treatment have been tried over the years. A variety of topical concoctions from antibiotic pastes to disinfectants to kerosene have been applied with varied success. We recommend careful surgical debridement to remove all remnants of the canker followed by cryotherapy of the base and surrounding tissue. A topical dressing of 10% benzoyl peroxide in acetone with powdered metronidazole antibiotic is then packed into the defect where the canker was. This is changed daily until the area is completely healed. A very dry environment is critical to success!

-Dr. Wade Hammond