DETECTION OF UNSOUNDNESS
AND
VICE IN HORSES.

BY-
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DETECTION OF SOUNDNESS
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Detection of unsoundness and Vice in Horses.

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Detection of Unsoundness and Vice in Horses.

1. Unsoundness.

What is Soundness? - Just what is meant by a sound horse is a much disputed question. Many litigations have arisen over the interpretation of the word. Veterinarians as a rule have very little knowledge of law and lawyers know less about veterinary subjects and hence it is difficult for them to agree upon a definition of soundness.

Strictly speaking, sound, means without imperfection or blemish but such a condition is seldom if ever met with. Veterinarians define soundness from a medical point of view; lawyers look at it differently and the predominating idea among them is that a horse is sound if he is able to perform in a satisfactory way the work for which he is fitted by nature.

The latter definition, though commonly accepted, is dangerous and many deceptions are fostered by it. Unsoundness is any deviation from the normal state and is therefore the perfection of animal health and form. Taplin in one of his books writes, "A sound horse should possess a perfect state of both frame and bodily health, without exception or ambiguity, the total absence of blemishes as well as defects, and freedom from every imperfection and all impediments to sight and action". The adoption of such a standard as this would put an end to much of the useless expenditure in lawyer's fees. Lawyers realize this and insist in defining soundness in a compromising way. In this article the definition will be given its strictest interpretation, very aptly expressed in the above words of Taplin. This stand is taken on the ground that if
the buyer be able to detect unsoundness he can also judge the degree to which the animals usefulness is impaired.

**Importance to Breeders and Dealers.**—The value of a knowledge of the more common defects of the horse to the breeder and dealer cannot easily be overestimated. It is of importance to the former on account of the tendency of any inherent weakness in any animal to be transmitted to its offspring. The knowledge that such weakness exists and that it is transmissible is certainly of great value in the selection of breeding animals.

The dealer who cannot, in a few minutes, make a systematic examination of an animal and detect malformations, symptoms of diseases and common vices, if they be present, is at the mercy of unscrupulous horse-traders. The general farmer's welfare is also sufficiently affected by the horse business that a knowledge of this subject may, many times, mean dollars and cents to him.

It is the purpose of this paper to give briefly the symptoms of the more common and serious blemishes, unsoundness, and vices that affect the equine race.

**Diseases Constituting Unsoundness.**

**Diseases of the Bone.** Bone Spavin.—This disease is due to inflammation between the bones of the hock joint. To lessen the ensuing irritation nature throws out a bony deposit cementing the bones together. This bony bunch is thought by many to be the cause of the lameness, while in fact it is a result of it, and in many cases is the agent by which lameness is removed.

The use of both hand and eye are essential in the detection of spavin. The examiner places himself by the horse's (correspondent) fore limb and stooping his body obtains a good profile of
the inside of the hock where the exostosis makes its appearance. By comparing the sound hock with the suspected one any small defect in the latter will be apparent to the practiced eye. If ocular examination is not satisfactory it is an advantage to couple the feel with the sight. The surface of the inside of the hock is naturally uneven with protuberances and depressions and some practice is necessary before one can detect abnormal inequalities. The novice is much aided, however, by comparing the suspected hock joint with the sound one.

A horse is often lame in the hock joint without any outward appearance of spavin. The exostosis is not apparent to either eye or hand and diagnosis is thus rendered very difficult. Other methods must then be resorted to, to locate the lameness. The horse may go lame when started but will "warm out" of it. If the hock joint be flexed and held in that position for a minute or two, then suddenly released and the animal be struck a smart blow to make him start quickly the presence of spavin will usually cause marked lameness of the horse in taking the first few steps. The animal is unwilling to step from side to side and when compelled to, does so with a decided hop. In turning suddenly the animal displays a jerky lameness, similar to string holt. In standing the hock is slightly flexed, the weight of the body is thrown as much as possible on the toe, as it is also in moving. This causes the toe to be excessively worn.

Ringbone. — Ringbone is of the same nature and is caused in the same way as spavin but is located in the pastern joint, cementing together the large and small pastern bones and making the joint practically immovable. It occurs more frequently on the hind than on the fore feet. It is usually apparent to the eye
but if not the hand should be passed over the part that no small tumor may escape detection. There is more or less lameness which is increased by making the animal travel in a circle and make short turns. Lameness is more decided on hard than on soft ground. In stepping the foot is held stiffly and the foot leaves the ground with a "snatchy" movement. Atrophy of the muscles due to their inactivity grows more apparent as the case becomes one of long standing.

Side bones.-- Are common to the front feet only. They may be detected by pressing the thumb and finger on the back part of the foot just above the hoof. Small, hard prominences in that region denote the presence of sidebones. The foot is stiffened and lamed more on hard ground than on soft.

**Diseases of the Teeth.**-- The teeth of a horse should always be carefully examined as the general health of the animal depends in a large measure on the proper working of these highly useful members. Chronic in-digestion, colic, and in fact many digestive disorders are very frequently traceable to bad teeth. They frequently cause swellings and ulcerations on the face of the animal. They may be detected by the foul odor they give to the breath and saliva. A horse afflicted with diseased teeth will stop chewing suddenly and spit out the food which has become quidded up in his mouth. When drinking they will stop suddenly and start back. When driven they show a tendency to hold the head on one side and drive on one line.
Poll Evil and Fistulous Withers. These diseases are identical in nature except that the former is situated on the crest of the head just back of the ears, while the latter is a disease of the withers or lower neck. In both there is a collection of pus which at first causes but little pain on manipulation but gradually becomes more painful as the pus increases. There is a yellow serum in the swelling at first which gradually turns to pus as the disease progresses. This pus tends to burrow down between the muscles, sometimes breaking out at a considerable distance from the original swelling. The swelling on one or both sides is at first diffuse later becomes circumscribed.

Curb. A curb does not always cause lameness. If lameness is present it is due to a sudden strain of the ligaments of the hock or may be due to spawn which frequently accompanies curb. Instead of a straight line from the point of the hock to the fetlock joint there is a convex swelling reaching three or four inches below the hock. In some horses this line is naturally curved but in such a case it may be told from curb by manipulation. The natural "curby" hock is soft and movable while the diseased one is hard and immovable. The reinforcing ligament of the peroneus tendon may be enlarged but this differs from curb in extending further down the leg.

Diseases of the Respiratory System.

Roaring and Whistling. This disease is due to any cause that may obstruct the passage of air thru the larynx and in most cases is due to paralysis of the muscles which control the lid of the glottis. This remains perfectly closed and as the air passes over it, makes a whistling or roaring sound.
The suspected horse should be driven or ridden on full stomach for about one-half a mile then by applying the ear near the region of the throat the tell-tale sound may be detected. If not apparent the first time the animal should be exercised briskly again and again until no doubt remains as to his soundness in this region. Allowing him to rest a few minutes after brisk exercise, before applying the ear to his throat is often the best method.

**Heaves.** Heaves is due to the aircells of the lungs being ruptured and a diseased condition of the pneumo-gastric nerve. This disease is usually detected by a deep grunting cough which is very characteristic. There is usually mild indigestion and passing of gas from the bowels. Inspiration is free and natural while expiration is labored. There is a double bellows like action of the flank, caused by a voluntary contraction of the abdominal muscles in an extra effort to expel the air from the lungs. This disease usually occurs in greedy feeders.

**Diseases of the Eye.**

**Paralysis of the Optic Nerve.** In this disease the retina of the eye is entirely unresponsive to the sensation of sight. The external appearance of the eye may, however, remain normal, the eye being clear and bright. The existence may be tested by passing the finger before the eye, in which case if the animal be blind he will not wink. The animal's sense of touch and hearing is greatly enhanced, so the finger must be passed slowly, or the horse will detect its proximity through the other senses and the test will fail. The best test is to place the horse in a dark stable and hold a candle close to the eye; the pupil will not change.
in size if the disease is present as it does normally. Leave the horse in darkness for a time then present a lighted candle to his eye suddenly and note if he gives any indication of being conscious of its presence.

**Simple Ophthalmia.**—This is a simple inflammation of the membrane covering the eye. The eye is red and irritated, the lids are swollen and there is a profuse discharge of tears. The blood vessels on the surface of the eyeball are distended with blood and the eye presents a milky or bluish appearance. Strong light is irritating to the eye.

**Periodic Ophthalmia.**—When a horse is afflicted with the disease the result is usually total blindness. In early stages the "haw" is drawn nearly across the eye, tears are shed profusely the presence of light is exceedingly painful to the eye, the cornea is clouded. In a week or so the eye clears up leaving a light yellow band about the iris which becomes more marked in each succeeding attack. As the disease progresses lymph and pus collect in the aqueous humor, the cornea becomes white and clouded and in the end is permanently so.

**Cataract.**—Cataract consists of opacity of the lens of the eye and may be partial or complete. It begins as a small spot then gradually spreads over the whole eye. In examining a horse's eye do not let your own sight be confused by the reflection of surrounding objects but examine the eye from all angles.
Diseases of the Nervous System.

**Chorea.** - One form of this disease is known as "string-halt" in which the control of the hind legs is lost. The feet jerk up high in stepping sometimes striking the belly. This is aggravated by cold weather and when the animal has been standing for some time.

The other form of this disease known as "immobility" is identical in nature with string-halt but a different set of nerves seem to be afflicted and the horse has great difficulty in starting, the hind feet seeming to be glued to the ground. After starting however the animal may go along very nicely.

Diseases of the Skin.

**Mange.** - This disease is caused by a parasite and is contagious in its nature. Its presence is shown by a rough, staring, scabby skin. The horse is constantly biting and scratching himself and sores and hairless places make their appearance on different parts of the animal's body. Many other skin diseases are similar to mange in nature and symptoms but not as serious an unsoundness, but any animal whose skin presents the appearance described above is a good subject to leave strictly alone.

**Warts.** - These tumors, while not interfering with the animal's usefulness, except when located on parts of the animal where the saddle or harness may cause irritation, certainly do not add to his appearance. However they are very easily detected and the buyer may use his judgement as to their importance.
Diseases of Lymphatic Glands.

Glanders and Farcy.—Are modifications of the same disease. In both the lymphatics or absorbent vessels are affected and in both nature makes an effort to throw out of the system an animal poison. The different modes of accomplishing this expulsion determines the difference between the diseases. In glanders it is thrown out thru the nostrils while in farcy it collects in little hard, swellings called "farcy "buds" which discharge the poison of the disease.

Glanders is recognized by a characteristic discharge from the nostrils associated with the enlargement of the submaxillary lymphatic glands. The mucus from the nose is at first slightly yellow or amber colored soon becomes viscid, adhering to the rim of the nostrils and to the hair around it. The discharge flows very slowly, in fact seems to be stationary and is thrown out in lumpy masses during the effort of snorting or on exercise. The membrane lining the nasal cavity loses its normal color and assumes a leaden hue, as the disease progresses ulcers also appear in this region.

Farcy usually begins by a swelling on the inside of the legs but sometimes the buds appear on the lips. These buds enlarge and break and a thin oily colored fluid, escapes and coagulates on the hair surrounding the ulcer. Though there are other diseases presenting nearly the same symptoms as farcy and not nearly so serious, yet a swollen ulcerated leg may well be suspicioned and the opinion of a competent veterinarian should be obtained at once.
Diseases of the Feet.

Laminitis.- Is caused by inflammation of the sensitive laminae of the foot and appears in two forms, the acute and the chronic. In acute there is severe inflammation of the front feet which are hot to touch, the pulse is hard and wiry. Sometimes the horse will lie down and roll in pain. If he can walk at all it is with a stiff stilted gait.

Chronic Laminitis may follow the acute form or may come on without being preceded by the acute. The symptoms are the same as in acute but not so marked. In cases of long standing the horse becomes contracted.

Corns. The horse that is afflicted with corns, shows it by a severe lameness and by trying to step on the side of his root; this is more apparent when traveling on hard roads. In standing the horse keeps his weight on the toe. The corn appears to the eye as a small dark spot on the sole of the foot. If the sole is cut through a characteristic, ill smelling, watery, fluid escapes.

Vices.

The nature of vice is such that it leaves very few signs by which it may be recognized. In examining a strange horse for signs of vicious habits much can be learned in observing the manner in which the groom goes about the animal. Observe how the horse is tied and note the expression of his face. Have him tied loosely in the stall and watch him unobserved for a while. Ask to examine his feet and judge the horse's disposition from the manner in which the groom handles the horse. If a strap is buckled tightly
about the horse's neck he is probably addicted to the habit of cribbing. Examine his teeth and if the horse is a cribber you will find his teeth are beveled off in a peculiar manner. The horse may be subject to vices of which he will give no sign for weeks when they will suddenly crop out. A man may be said to be thoroughly acquainted with an animal only after raising him or owning him for a number of years.