

Straightening Legs

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Until somewhere between the ages of 18 months to 2 1/2 years the bones of a horse's leg are growing and somewhat pliable - their eventual permanent shape and position can be affected by hoof balance and the way they use their legs.

Neglecting regular hoof care at this stage may result in crooked legs if the hoof wall grows too long and breaks off unevenly. Conversely, purposely trimming the hooves out of balance is sometimes done in an effort to straighten legs which are crooked. Although braces and epiphyseal stapling are alternatives, corrective trimming can often improve or eliminate deformities due to injury or neglect, if caught in time.

To be successful, corrective trimming must affect only the bone that needs it and not other already straight bones too - simply trading one deformity for another. Fortunately, this can be done because hoof balance has diminishing effect on bones higher up the leg, and the bones closer to the hoof stop growing and harden before those higher up the leg. Though not visible to the naked eye, the end of the bones pliable growth stage is indicated by the disappearance of the epiphysis, or growth plate, when viewed on a radiograph. The pastern bones may be affected by hoof balance up until closure at 6 to 9 months of age with minimal effect on the cannon bone. After closure of the pastern bones, they can no longer be changed permanently by hoof balance; but the cannon bone can be affected until it closes at 8 to 12 months of age. Hoof balance will not appreciably affect bones above the knee.

Straightening is not advisable for most genetic traits. A weanling with a neck that is too short for his leg may spread his front legs wide to reach the ground, eventually causing him to toe out permanently. Attempts to overcome that by corrective trimming alone will be disappointing and likely to cause additional problems. Balanced trimming and feeding him at his chest level will bring much better results. Genetic deviations from straight legs usually are not helped by attempts at straightening. Hind legs function better if they are slightly toed-out, and minor deviations in front or hind legs can be found among the top horse athletes.

Halter horses' genetic deviations are usually 'fixed' by corrective trimming, in an effort to fool the judge, but the result is a horse that despite standing straight performs poorly because of uneven stresses in his joints. Sharper judges are learning to spot the unlevel coronary bands of a 'fixed' horse and give preference to the naturally straight, and even the slightly crooked, but natural horse. When the majority of judges do that the athletic ability of halter horses and their entire breed will improve.

For more information:

Adams, O.R., 1974, Lameness in Horses, Philadelphia; Lea & Febiger
Butler, K.D., 1985, The Principles of Horseshoeing, 11; Maryville, MO;
Butler Crotts, L.S., 1985, Shoeing to Win; Atlanta; Centurion Press
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Addendum 2008: Medial or lateral extensions in glue-on form are now readily available and may be used in place of braces, stapling, stripping and "corrective" trimming, etc.