Cook, W.R.: "Alternative Drooling Research" *Dressage Today* November, 2001, p 15

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Dear Editor.

Through the courtesy of your columns, may I provide an alternative answer to your reader's question on the significance of drooling in a bitted horse at exercise (*Dressage Today*, August 2001)? I write wearing my veterinarian's hat (one that I have worn for 49 years) but wish to disclose at the outset, and quite unashamedly, that for the last 12 months I have also taken to wearing a salesman's hat, as chairman of The Bitless Bridle Inc.,

Dr. Stephen Soule provides an answer that is in accord with a long-standing tradition, to the effect that drooling is a virtue not a vice. The judges that he consulted concurred and gave it as their opinion that a horse that produces frothy saliva "is a happy, well-bitted and relaxed horse." They even confirmed that such a horse would be scored higher than one that did not drool.

Unfortunately, neither Dr Soule nor the judges appear to be aware of research I published two years ago (Cook 1999). This research explains why drooling at exercise is neither a virtue nor a vice, but the physiological result of placing one or more foreign bodies (bits) in the mouth. The drooling of frothy saliva is only one of a number of reflex responses that can be expected from such a step. Apart from reflex salivation, other responses include movement of the lips, jaw, and tongue. The bit also breaks the otherwise airtight seal of the lips. Because of this it admits air into the oral cavity and, in the absence of food, allows saliva to escape. Often the bit results in a mouth that is frankly open and a horse that makes occasional swallowing movements. All of these are normal *digestive* system responses. They are entirely appropriate in a horse that is *feeding*.

But if a horse is exercising, none of these responses are appropriate. For the deep breathing of exercise, an entirely opposite set of responses is required. The mouth should be shut and the lips sealed. There should be no air in the mouth and the mouth should be relatively dry not wet. The jaw and tongue should be stationary in order that there is no interference with the airway from constant agitation of the soft palate and larynx. Finally, with regard to something that bit pressure is regrettably good at bringing about, the poll should not be strongly flexed, a position that further interferes with breathing.

From the above it can be seen that the bit method of control sets up a fundamental conflict. It confuses the exercising horse neurologically by stimulating inappropriate digestive system reflexes and it seriously impairs breathing. Like ourselves, horses can either eat or exercise. They have not evolved to be capable of doing both at the same time. Drooling is an outward and visible sign that digestive system reflexes have been initiated. It is an inappropriate activity in an exercising horse. But the horse should not be blamed for the fault lies with the method of control.

Fortunately, a new bitless bridle permits improved control and allows dressage horses to perform better, without having to contend with the many handicaps of a bit. Being a painless method, it cures many a horse that suffers from bit-induced trigeminal neuralgia (the headshaking syndrome). As it is also compatible with the physiology of exercise and does not interfere with respiration, it represents a significant advance in equitation and the welfare of the horse (for more information visit www.bitlessbridle.com). The only bar to the adoption of the bitless bridle in dressage competitions is the current FEI regulation that makes use of a bit obligatory. As no bit is required for the more hazardous crosscountry or show jumping disciplines, the rationale for imposing a bit on a dressage horse is difficult to understand. It is to be hoped that the FEI will soon consider revising the dressage regulations and correcting this anomaly.

There will be those who regard my recommendation of a bitless bridle for dressage as being the height of heresy. Understanding the pain that this suggestion will bring to many who believe that use of a double bridle is an indispensable part of dressage, and that its use is sanctioned by the highest authorities, I call as witness William Cavendish, Duke of Newcastle. In his 1743 classic on "The New Method of Dressing Horses" he writes "...it is not a piece of iron can make a horse knowing, for if it were, the bitt-makers would be the best horsemen: no, it is the art of appropriate lessons ... and not trusting to an ignorant piece of iron called a bitt; for I will undertake to make a perfect horse with a cavesson without a bitt, better than any man shall with his bitt without a cavesson; so highly is the cavesson, when rightly used, to be esteemed. I dressed a barb at Antwerp with a cavesson without a bitt, and he went perfectly well; and that is the true art, and not the ignorance and folly of a strange-figured bitt."

## Sincerely,

W. Robert Cook FRCVS., PhD., Professor of Surgery *Emeritus* Tufts University School of Veterinary Medicine 200, Westborough Road N.Grafton, MA 01536

Home telephone (410) 778 9005 E-mail: drwrcook@aol.com

## Reference:

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