

Accepted Manuscript

Assessing the influence of upper lip twitching in naïve horses during an aversive husbandry procedure (ear clipping)

Ahmed B.A. Ali, Katelyn L. Gutwein, Camie R. Heleski

PII: S1558-7878(17)30051-5

DOI: [10.1016/j.jveb.2017.07.001](https://doi.org/10.1016/j.jveb.2017.07.001)

Reference: JVEB 1066

To appear in: *Journal of Veterinary Behavior*

Received Date: 7 March 2017

Revised Date: 15 June 2017

Accepted Date: 11 July 2017

Please cite this article as: Ali, A.B.A., Gutwein, K.L., Heleski, C.R., Assessing the influence of upper lip twitching in naïve horses during an aversive husbandry procedure (ear clipping), *Journal of Veterinary Behavior* (2017), doi: 10.1016/j.jveb.2017.07.001.

This is a PDF file of an unedited manuscript that has been accepted for publication. As a service to our customers we are providing this early version of the manuscript. The manuscript will undergo copyediting, typesetting, and review of the resulting proof before it is published in its final form. Please note that during the production process errors may be discovered which could affect the content, and all legal disclaimers that apply to the journal pertain.



1 Assessing the influence of upper lip twitching in naïve horses during an aversive husbandry
2 procedure (ear clipping)

3 Ahmed B.A. Ali ^{a,b}, Katelyn L. Gutwein ^c and Camie R. Heleski ^d

4
5 ^a Animal Behavior and Welfare Group, Michigan State University, East Lansing, MI 48824,
6 aliaba@msu.edu

7 ^b Also at Animal Behavior and Management, Veterinary Medicine, Cairo University, Egypt,
8 ahmed_badr@cu.edu.eg

9 ^c Department of Animal Science, Michigan State University, East Lansing, MI 48824,
10 gutweink@msu.edu

11 ^d Now at Department of Animal and Food Science, University of Kentucky, 212N Ag North
12 Lexington KY 40546-0091, camie.heleski@uky.edu.

13
14 **Abstract:** When engaging in procedures that horses may find aversive, restraint methods
15 are often employed to help ensure safety of both horse and handler. Twitching is a common
16 restraint method, but its use is sometimes considered controversial. Based on previous work
17 there is evidence supporting the concept of the twitch acting more nearly like acupuncture. Our
18 aim was to compare behaviors, heart rate (HR), Heart Rate Variability (HRV), and ease/time of
19 completing procedure when naïve horses were ear clipped with or without a twitch. Clipping out
20 the inside of a horse's ear is considered a routine, competition-preparation procedure for many
21 horses, particularly in the US. Many horses, however, find the procedure aversive and make
22 attempts to avoid it. Eight Arabian horses (4 mares, 4 geldings; mean age 2.8 yrs. \pm 1.0) that
23 were naïve to ear clipping and twitching were tested during fall 2014. Baseline HR and HRV
24 data were collected. Horses were randomly assigned to either being clipped with a twitch (ECT1)
25 or clipped without a twitch (EC) as their first treatment, then vice versa for their second
26 treatment. Later, each horse was twitched a second time and clipped (ECT2). Time elapsed to
27 perform ear clipping, behaviors, summed ear clipping reactivity score (ECSR), HR (bpm), time
28 domain indices of HRV (SDRR and RMSSD) and power spectral analysis indices High

Download English Version:

<https://daneshyari.com/en/article/5535980>

Download Persian Version:

<https://daneshyari.com/article/5535980>

[Daneshyari.com](https://daneshyari.com)