



Take away the pain

While pain mitigation adoption is currently low, farmers say they want to make dehorning a less stressful experience.

by Olivia Hennes

DEHORNING has captured more attention recently, both on-farm and in the media. The average American is three generations removed from the farm, and as a result, these consumers sometimes do not understand the reasoning behind practices such as dehorning or disbudding. While this disconnect can be frustrating at times, consumer concerns motivate us to rethink certain on-farm protocols for the better.

UW-Extension Outagamie County Dairy and Livestock Agent Zen Miller began his dehorning research last year by conducting a survey of 200 people from diverse backgrounds at eight different events. At each event, participants were asked to watch a series of three short videos demonstrating different disbudding practices and levels of pain management: calf dehorned at 3 months of age with no lidocaine (pain medication), calf dehorned at 6 weeks of age with lidocaine, and a newborn calf disbudded with caustic paste. After watching each video, participants were asked to rank the level of animal pain the general public may perceive: extremely painful, very painful, some pain, very little pain, and no pain.

Based on the videos, 43 percent of participants rated the practice of dehorning a 6-month-old calf with no lidocaine as extremely painful, with another 22 percent who felt it was very painful. On the flip side, 45 percent of the participants rated the dehorning practice at 6 weeks of age with lidocaine as very little pain. The use of caustic paste at processing within one hour of birth was rated by 56 percent of the viewers as no pain.

One of the most striking results from Miller's study was the fact that 88 percent of farmers were concerned about the public's view of

disbudding, and yet only 18 percent used pain management. Meanwhile, 26 percent of farmers indicated a lack of understanding on how to use pain mitigation as the reason for not using it.

In order to best care for our herd and give the general public a more favorable opinion of disbudding, we need to ensure animals are being handled in a way that provides the smoothest transition through one of the most stressful times of life. This includes proper dehorning methods and something to ease the pain.

Demonstrate the options

In 2015, former UW-Extension Outagamie County Dairy and Livestock Intern Bethany Marcks partnered with Miller to begin the second part of the study. Farmers were interviewed about on-farm dehorning practices, and farm owners and employees were shown potential pain mitigation techniques. Since only 18 percent of farms in the previous survey indicated they used pain management when dehorning, one of the main goals of the visits was to share with farmers the various dehorning methods.

In all, Marcks visited 46 farms and demonstrated dehorning at 22 locations. Overall, 179 calves were dehorned and 50 people were trained on proper dehorning procedures. Marcks also taught farmers pain mitigation strategies and proper injection methods for local anesthetics in dairy calves.

While visiting these farms, Marcks demonstrated a variety of dehorning methods:

- 39 calves dehorned with Dr. Larson's Dehorning Paste
- 41 calves dehorned with Dr. Naylor's Dehorning Paste
- 31 calves dehorned with a hot iron and given a local anesthetic
- 4 calves dehorned with a hot iron and given a nonsteroidal anti-inflammatory (meloxicam)
- 31 calves dehorned with a hot iron and given both lidocaine and meloxicam

EARLIER DEHORNING, pain mitigation, and polled genetics are all ways to make dehorning a less stressful event for dairy calves. In a recent Wisconsin study, most of the farms (88 percent) wanted to limit pain and improve consumer perceptions about dehorning.

- 16 calves dehorned with a hot iron and no pain management

As the old saying goes, "Seeing is believing." After working with Miller and Marcks, 64 percent of the participating farms changed their dehorning protocols.

Timing matters, too

Besides providing pain medication, one of the most important things to keep in mind when it comes to dehorning is that the horn bud attaches to the skull, known as ossification, between 30 and 60 days of age. After attachment, dehorning becomes more traumatic, reducing daily rate of gain and causing unthriftiness in calves.

According to Miller's survey of 78 farmers, 49 percent indicated they dehorn calves before 60 days of age. Disbudding earlier with the use of an anesthetic or caustic paste is not much more expensive or time consuming and could easily be adapted on most dairy farms.

Even if farms dehorn calves at an early age, providing some form of pain management is still important and should be part of a dehorning protocol. Beyond the benefit that calves will struggle less when being dehorned with a hot iron, pain medication is also inexpensive and can help calves transition smoothly back into their normal routine.

A local anesthetic, such as lidocaine, can be injected on each side of the head to temporarily block the cornual nerve. Some farmers also choose to provide a form of analgesia, which will help calves to manage pain once the effects of the nerve block have worn off.

Consider polled options

The survey determined that 18 percent of responding farmers currently included polled bulls in their breeding programs. Many farmers, however, indicated they chose not to include polled bulls in their breeding selections because they felt polled bulls lack adequate genetics for other performance traits. They also commented that polled semen is more pricey.

Still, 27 percent of farmers were interested in learning more about polled genetics. In all, a current list of polled bulls was given to 39 of the farms.

This study demonstrated the desire of farmers to provide animals with less stressful treatments. As an industry, on-farm education about ideal practices is the best thing that can be done to change outdated procedures, including disbudding protocols.

If dehorning with a hot iron is your chosen method, view pain management as a necessity, not just an option. Veterinarians or other experienced individuals can aid in the development and implementation of new protocols. The use of pain management pre- and postdehorning will promote a consumer-friendly image and prevent unnecessary stress to our calves. 