

Safety should be a team sport on dairies

by Auguste Brihn, D.V.M., Conrad Spangler, D.V.M., and Jeff Bender, D.V.M.



DAIRY farming is a dangerous job, and dairy workers are at high risk of personal injury. In fact, dairy farming has the second highest prevalence of injuries among U.S. agricultural groups. A review of dairy-related workers' compensation indemnity claims in Minnesota accounted for over \$2 million in costs from 2003 to 2011.

The majority of these worker injuries on dairy farms are related to cattle handling, often resulting in job restrictions. However, contact with animals (and infectious diseases), machinery, noise, and repetitive movements all contribute to injuries, illnesses, disability, and fatalities related to dairy production. These worker compensation claims only represent the very tip of the iceberg.

Access to resources

In a survey of Minnesota dairy farms (with herds under 500 cows), it was observed that these smaller operations do not have access to worker safety resources. Of the 32 workers

from 10 dairy operations completing the survey, 10 workers (31.3%) were Hispanic and eight workers (25%) had no previous livestock experience before their current job.

Only 14 (50%) workers received training related to safety and injury prevention. Six (19%) suffered at least one injury in the prior 12 months. These data illustrate that worker safety and injury prevention training is needed on small and medium-sized dairies. To address this void, a "team approach" is needed.

As part of an initiative led by the University of Minnesota's Upper Midwest Agricultural Safety and Health (UMASH) program, we have identified veterinarians as key partners for creating a health and safety team on dairy farms. The number of dairy farms in Minnesota and across the nation has continued to decline; yet the number of cows per farm, employees per farm, and milk production has grown over the past decade.

Veterinarians fill a role

As farms change, there is a need to reframe our approach to support our producers, their animals, and their workers. To do this, we should

include veterinarians to work with producers and herd managers to ensure a holistic approach to animal welfare, a healthy work environment to minimize injuries and illnesses, and educational input into the training of workers. Veterinarians can provide these inputs to owners as part of their regular herd visits while improving the working environment and the economic bottom line.

As part of the health care team, there are a number of ways veterinarians can help support employee health and safety. First is the recognition of potential hazards. This can include identifying zoonotic disease risk while working with calves. It may involve rapid detection of potential zoonotic agents (such as *Cryptosporidium parvum* and salmonella) and ways to improve biosecurity to minimize disease spread.

This should include education about disease prevention. It could be re-emphasized in a preventive manner with a simple checklist to identify hazards and develop solutions to minimize those risks by working with the producer.

Secondly, veterinarians or veterinary technicians can take a more active role in training, especially regarding animal welfare and handling. These supportive roles can include brief educational programs on moving and restraining cattle, handling transition animals, or improving milking parlor etiquette.

This should include educational training for immigrant workers. In the most recent estimates, 51% of all dairy workers are immigrants often working on larger operations. Nearly 80% of the milk produced in the U.S. is on farms that employ an immigrant workforce. Our training programs need to consider the limited experience and language barriers with these workers.

Appropriate animal handling

or "low-stress" animal handling techniques are important to a workforce not familiar with dairy cattle. We have prepared several short videos and training guides to support this effort in both English and Spanish that can be found at on.hoards.com/animalhandling.

Veterinarians should also consider learning Spanish to better communicate with workers directly. During routine health visits, veterinarians can provide informal audits or observations on animal handling that could become part of their visit report back to owners and producers. In addition to this effort, it is important to also take a multidisciplinary approach and work with other partners such as industrial engineers to provide safety recommendations for other areas of the farm that veterinarians may be less familiar with such as equipment and barn chemicals.

With goals in mind

This focus on dairy health and safety falls well within the stated goal of the National Dairy Farmers Assuring Responsible Management (FARM) Program. The National Dairy FARM Program provides excellent guidance and best practice resources for veterinarians and producers alike around worker health and safety. These materials can be found at on.hoards.com/FARMresources.

Veterinarians have a broad understanding of the Center for Disease Control and Prevention's One Health principles, especially as it pertains to human-animal interaction so they can be key partners in promoting worker health and safety. We need to encourage a broader approach to create a safe work environment for cattle and humans; veterinarians can be part of that safety team. 🐄

Brihn and Bender are with the University of Minnesota College of Veterinary Medicine. Spangler is a veterinarian for Riverview LLP.

Used by permission from the May 10, 2020, issue of Hoard's Dairyman. Copyright 2020 by W.D. Hoard & Sons Company, Fort Atkinson, Wisconsin.