



ANIMAL CARE QUICK REFERENCE USER GUIDE

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The Animal Care Quick Reference User Guide is a convenient resource summarizing best practices that should be in place on your farm to assure success in the National Dairy FARM Program: Farmers Assuring Responsible Management [™].

The FARM Program was created by the National Milk Producers Federation (NMPF), with support from Dairy Management, Inc. (DMI), to demonstrate and provide verification over time that U.S. dairy farmers are committed to providing a high level of animal care and quality assurance. Voluntary and available to all dairy farmers, the FARM Program establishes an on-farm animal care program and a system for Third-Party Verification that demonstrates that dedication.

We encourage you to use the Animal Care Quick Reference User Guide as a supplement to the FARM Program Animal Care Reference Manual and accompanying animal care training videos. The Animal Care Reference Manual and videos are comprehensive tools that provide more detail about the program, on-farm evaluations, best practices, management checklists and Third-Party Verification. The Animal Care Reference Manual also includes definitions of important terms, an appendix and lists of additional resources.

For best outcomes and a full understanding of the FARM Program, it's important that you thoroughly review the Animal Care Reference Manual and watch the training videos. Chapters 2 and 11 of the Animal Care Quick Reference User Guide address on-farm evaluations and Third-Party Verification, respectively. The remaining chapters include animal care topic summaries, best practices and management checklists in the following categories:

- Management
- Newborn and Milk-Fed Dairy Calves
- Nutrition
- Animal Health
- Environment and Facilities
- Handling, Movement and Transportation
- Special-Needs Animals
- Dairy Beef

Thank you for your participation. U.S. dairy farmers have a longstanding commitment to doing what's right. Your decision to be a part of the FARM Program illustrates that dedication and is an important step in assuring consumers that you care for the safety, comfort, and well-being of your animals and that the dairy products you produce are safe, wholesome and nutritious.

If you have questions about the National Dairy FARM Program please call NMPF at (703) 243-6111 or log on to www.nationaldairyfarm.com.



CHAPTER 2 ON-FARM SECOND-PARTY EVALUATIONS

The on-farm Second-Party Evaluation provides an external review of animal care practices based on FARM Program guidelines. The results of the initial Second-Party Evaluation will provide dairy farmers with a status report and enable them to develop an action plan (in consultation with trained professionals) for continuous improvement if necessary. Subsequent Second-Party Evaluations, at least once every three years, will enable the dairy farmer to track progress in on-farm care of the animals.

A veterinarian, extension educator, co-op field staff person, university personnel or otherwise qualified personnel who have completed FARM Program training can perform Second-Party Evaluations. Second-Party Evaluators will use the Management Checklists provided in the FARM Program to conduct the Second-Party Evaluation.

At the conclusion of a Second-Party Evaluation an Action Plan is developed, if needed, by the dairy farmer and the herd veterinarian or other qualified professionals for those areas identified as needing improvement.



CHAPTER 3 MANAGEMENT - STANDARD OPERATING PROCEDURES (SOPS), TRAINING AND RECORD KEEPING

When addressing management, it is important to describe the procedure, train to the procedure, document the completion of the training and monitor it over time. Written SOPs are reviewed annually and considered a best practice. The written information would benefit another employee stepping in to assist. Train and educate animal caretakers about animal care expectations and animal well-being policies. The operation must have a written Herd Health Plan, as well as training and protocols for handling, transportation and movement, and euthanasia for cattle for all ages and health conditions.

	YES	NO	DON'T KNOW/ N/A
The dairy has a documented Veterinarian/Client/Patient Relationship.			
Documentation exists of training for new and existing animal caretakers at least on an annual basis.			
Written SOPs are readily available, and in many cases posted, in the native languages of personnel assigned animal care responsibilities.			
Emergency contact information is readily available to address animal care needs arising from unique circumstances such as a fire or natural disaster, equipment failures and power failures.		KD	49
Each animal is permanently identified and an effective record-keeping system is employed for animal care and management decision making.			
A specific milking routine, procedures and actions are followed to ensure cow comfort and well-being.			DAIRY GRAM

CHAPTER 4 NEWBORN AND MILK-FED DAIRY CALVES

Under best practice, all calves receive colostrum or colostrum replacer and are fed in a way that promotes health and reduces the risk of disease. Colostrum quality is highly dependent on early harvest (within two hours of calving). Health is maintained through preventive care programs augmented by rapid diagnosis and treatment when necessary. Animal caretakers are adequately trained to follow established protocols. Calves are provided space to stand, lie down, adopt normal resting postures and have visual contact with others calves. Calves are provided an environment that is clean and dry, and protected from seasonal weather extremes. Calves are handled, moved and transported in a manner that reduces the risk of the potential for injury, distress or disease.

	YES	NO	DON'T KNOW/ N/A
All calves receive colostrum or colostrum replacer soon after birth, even if immediately transported off the farm.			
Calves receive a volume and quality of milk or milk replacer to maintain health, growth and vigor until weaned or marketed.			
Calves have access to palatable, clean, fresh water as necessary to maintain proper hydration.			
Calves are offered fresh, palatable starter feed.	NE	KD	
Identified animal caretakers are trained in calf care nutritional requirements, including use of esophageal tube feeders and other feeding mechanisms.			

WATER

Fresh, clean water is essential for the health and well-being of the animals. Access to waterers – large tanks, troughs, buckets or fountains – is essential for cattle to satisfy their need for water. Under best practice, waterers are convenient for the animals to reach on demand, and there are sufficient waterers (number, size and capacity) to accommodate the number of animals in the group. When continuous access is impossible for other classes of animals besides lactating cows and non-lactating cows, water must be made available to allow animals to drink to satiation at least twice per day (more often under heat stress conditions). In best practice, water is prevented from freezing in cold weather or animals are provided access to fresh water as soon as possible.



FEED

Feed considerations include nutritional quality and quantity, feed bunk design and proper feed storage. Advances in ruminant nutrition and feeding behavior science have greatly improved our understanding of dairy cattle production. As a best practice, dairy farmers monitor feed quality and nutrient content of feed components and provide adequate bunk space to allow all animals to feed simultaneously. Feed for other species is never mixed with dairy animal feed.

As a best practice, the dairy farmer evaluates protocols to assure that feeding programs meet the basic nutritional requirements for the animals' maintenance, growth, production, health and reproduction. Qualified nutritional consultants normally assist in formulating rations that economically meet nutritional requirements of animals.

	YES	NO	DON'T KNOW/ N/A
Rations provide the required nutrients for maintenance, growth, health and lactation for the appropriate physiological life stage.			
Feed equipment is washed and disinfected after being used for non-feed purposes.		PBO	GRA
Sufficient feed bunk space is provided that allows all animals to feed at the same time or sufficient quantities of feed are available for all animals during a 24-hour period.			

HERD HEALTH PLAN

An effective written Herd Health Plan emphasizes prevention, rapid diagnosis and quick decision making on necessary treatment of all sick or injured dairy cattle on the farm. A licensed veterinarian, or other appropriately trained veterinary consultant, can help dairy farmers develop and implement a routine Herd Health Plan. A sample Herd Health Plan is available at www.nationaldairyfarm.com.

	YES	NO	DON'T KNOW/ N/A
The dairy has a written Herd Health Plan, developed in consultation with the herd veterinarian, to prevent common diseases or conditions such as mastitis, lameness, metritis, metabolic diseases, displaced abomasum, pneumonia and infectious diarrhea.			
The written Herd Health Plan includes: Veterinarian/Client/Patient Relationship.			
Vaccination protocols.			
Daily observation of all cattle for injury or signs of disease.			
Protocols for newborn calf management.		RS	
Protocols for painful procedures.			
Protocols for cattle that develop disease or are injured.			
Protocols for dystocia.			
Protocols for prevention, detection and action for common diseases, and parasite and pest control.		ONA	
Protocols for fly control.			DARY
Protocols for non-ambulatory animal management.			GRADI
Protocols for euthanasia.			
Protocols to ensure food safety.			
Training programs for animal caretakers involved in detecting disease and injury, which include recording the cases and actions to be taken.			
The Herd Health Plan is reviewed and updated annually.			

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NEWBORN AND MILK-FED DAIRY CALVES

The written Herd Health Plan, developed in conjunction with a licensed veterinarian through a Veterinarian/Client/ Patient Relationship, includes information specific to the care of newborn and milk-fed dairy calves. Topics in the Herd Health Plan relevant to newborn animals include colostrum management, navel dipping, identification and record keeping, and protocols for vaccination, dehorning, supernumerary teat removal, castration, tail docking (to be phased out by 2022) and euthanasia.

 YES
 NO
 DON'T KNOW/ N/A

 The dairy has a written Herd Health Plan, developed in consultation
 Image: Construction
 Image: Construction

 with the herd veterinarian, which includes specific areas pertaining to newborn and milk-fed dairy calves.
 Image: Construction
 Image: Construction

NAVEL DIPPING

Dip navels in disinfectant as soon as possible after birth. If the umbilical cord is not severed immediately after birth, it may be tied two-to-three inches from the calf's body. Wet cords are entry points for pathogens into the calf's body. An effective preventive treatment is to dip the navel repeatedly into an effective antiseptic solution (discard used solution).

	YES	NO	DON'T KNOW/ N/A
	14	$\overline{N2}$	
Navels are dipped in an effective antiseptic solution as soon			
as possible.			

MEDICAL PROCEDURES

Certain painful medical procedures are necessary to ensure the safety of the workers and the animals on the farm. These procedures include dehorning, castration, branding, extra teat removal and tail docking (to be phased out by 2022). A best practice is for dairy farmers to work with their licensed veterinarian to develop an SOP that works best for the individual farm while providing appropriate relief from stress and pain to the animal. In addition, any animal caretaker responsible for performing the procedure receives adequate training.

	YES	NO	DON'T KNOW/ N/A
Calves are disbudded at eight weeks of age or earlier and with appropriate use of analgesics and/or anesthetics.	2		
All other planned medical procedures are performed at the earliest age possible and with appropriate use of analgesics and/or anesthetics.			

HYGIENE

Proper sanitation and waste management keep animals dry, clean and free of manure and provide them with comfortable surroundings. The goals of sanitation for animal facilities are to:

Minimize animal disease through clean facilities

Minimize generation of odors and dust

Minimize pests and parasites

Minimize spread of pathogens

Basic sanitation practices include keeping the interiors, corridors and storage spaces of animal facilities clean, and emptying waste containers. Facilities are free of standing water, excess manure, unnecessary farm items and clutter. Feed and bedding is clean and dry, even in areas with minimal housing and rainfall. Animal caretakers maintain a level of cleanliness to minimize the spread of pathogens. Manure is removed regularly from facilities and freestalls, and walkways are clean and have good traction.

	YES	NO	DON'T KNOW/ N/A
Ninety percent or more of all animals in all pens score 2 or less on the NDFP Hygiene Scorecard (1 is clean, 4 is dirty).			

LOCOMOTION

Lameness, caused by painful lesions to the limb or foot, seriously compromises well-being and is a management priority for the dairy herd. Foot lesions most commonly associated with lameness in dairy cattle include infectious hoof diseases such as digital dermatitis and foot rot, and non-infectious claw horn diseases that include white line lesions and sole ulcer. Lameness interferes with normal resting behavior, movement to and from the milking area and feeding activity. It also limits the exhibition of estrus and influences general health.

Lameness may be reduced by preventive hoof trimming performed to both balance weight bearing between the claws and restore a more upright foot angle, and by surveillance for lame cows coupled with prompt, effective treatment. Routine use of antibacterial foot baths assists in the control of infectious hoof disease, while improved flooring reduces trauma, slipping and wear, which lowers the risk for white line lesions.

CHAPTER 6 ANIMAL HEALTH

	YES	NO	DON'T KNOW/ N/A
Ninety-five percent of the lactating and dry dairy herd scores 2 or less on the NDFP Locomotion Scorecard (1 is sound, 2 is moderately lame, 3 is severely lame).			
The dairy farmer is taking action to improve animals with severe lameness.			
A lameness prevention protocol is in place.			

BODY CONDITION SCORING (BCS)

Achieving growth targets for heifers and monitoring change in body condition during gestation and lactation are very important. Body condition can change rapidly at and after calving and is used to guide ration changes. Body condition scoring for dairy cattle is an important management tool for optimizing milk production and reproductive efficiency, while reducing the incidence of metabolic and other peripartum diseases.

	YES	NO	DON'T KNOW/ N/A
Ninety-nine percent or more of all classes of animals score 2 or more on the NDFP BCS Scorecard (1 is thin, 5 is fat).	NPE	KD	45
The dairy farmer is taking action to improve animals with body condition scores less than 2.			

HOCK AND KNEE LESIONS

Hock lesions (swelling, abrasion and even ulceration) are an important indication of inadequate bedding and lack of animal comfort. Dairy farms with a higher prevalence of hock lesions also tend to have a higher number of lame cows. A healthy hock is free from hair loss (the hair coat is smooth and continuous with the rest of the leg) and swelling.

	125	NO	
Ninety-five percent of the lactating and dry dairy herd scores a 2 or less on the NDFP Hock and Knee Lesion Scorecard (1 is no hair loss/swelling, 2 is some hair loss/no swelling, 3 is severe swelling and/or abrasion through the hide).			

ANIMAL ENVIRONMENT

Proper management of the environment enhances animal performance, comfort and well-being. Facilities include all housing structures, handling structures, lots, pens, stalls, alleys and pastures that are inhabited by cattle of any age and health status. Facilities provide sufficient protection from temperature extremes and ensure the safety and care of the animals.

	YES	NO	DON'T KNOW/ N/A
Protection from heat and cold are provided for all age classes; tools include the use of shade, fans, water cooling and windbreaks.			
Protocols are in place to minimize airborne particles as a way to reduce odors and dust.			

LYING AREA

During their life, dairy animals make use of a variety of resting, feeding and exercise areas. At all ages, in best practice, cattle are able to stand up, lie down and adopt normal resting postures within a given system. Factors that can affect these behaviors include the size and configuration of the freestall or tie stall and the space provided to calves.

Housing allows cattle to easily stand up, lie down, adopt normal resting postures and have visual contact with other cattle.		
Cattle have a bed that provides comfort, insulation, warmth, dryness and traction.		
The dairy farmer monitors and takes action for slips and falls.		

SPECIFIC LIFECYCLE CONSIDERATIONS

A clean, dry, well-lit, well-ventilated calving area has many health benefits for the calf at the time of birth. Wet, dirty calving areas foster the growth of bacteria that can invade the newborn calf's navel or mouth and create a disease load that overwhelms the calf's naïve immune system. A separate calving area (maternity pen or paddock) that is designed to be comfortable, functional and hygienic allows for close observation of the cow and easier, more effective assistance at calving.

		YES	NO	DON'T KNOW/ N/A
A clean dry well lit well ventilated calving area is used	0			

CHAPTER 8 HANDLING, MOVEMENT AND TRANSPORTATION

Under best practice, cattle are handled in a calm, controlled and gentle manner. Animal caretakers are properly trained in animal handling and the consequences of inhumane handling are understood and enforced. Animal caretakers are assessed and retrained on a regular basis. Prods, canes and other cattle handling aids are only used in situations when needed to reduce greater damage, injury or harm to the animal caretaker or the animals. Cattle are moved in a manner that reduces the risk of slips and falls.

STOCKMANSHIP

	YES	NO	DON'I KNOW/ N/A
Animal caretakers working in animal movement are trained on the principles of flight zones and flight distances to know the importance of controlling the animal movement in lanes, alleyways and other parts of the complex.			
Animal caretakers have signed a cow care agreement.			
The dairy uses the "Top 10 Considerations for Culling and Transporting Dairy Animals" in handling and transportation decision making.		RS	4

NEWBORN AND MILK-FED DAIRY CALF HANDLING

Calves are handled in a calm, controlled and gentle manner. Animal caretakers are properly trained in animal handling, and the consequences of inhumane handling are known and enforced, as discussed above in the section on stockmanship.

	YES	NO	DON'T KNOW/ N/A
Animal caretakers are trained to handle and restrain calves with a minimum of stress to the animal.	FARM		DARY
Calves are moved by lifting, walking or mechanical conveyance.			GRADI
Transport devices used to move calves are clean, and properly designed and maintained.			

CHAPTER 9 SPECIAL-NEEDS ANIMALS

Even with the best care and adherence to the Herd Health Plan, animals can become ill, require medical treatment or euthanasia, or die. If an animal becomes sick, non-ambulatory or dies, it is critical to protect the other animals from potential diseases and to provide special care for the sick or recovering animal. A best practice on dairy farms includes being prepared to handle these conditions through proper employee training, segregation and prompt decision making to treat, market or euthanize an animal.

NUTRITION

When an animal becomes sick or injured requiring separation from the herd for medical treatment (special-needs animal), the recovery of that animal is enhanced through appropriate nutrition.

	YES	NO	DON'T KNOW/ N/A
Special-needs animals are not restricted from feed and water			
for more than four hours.			

ANIMAL HEALTH

Prompt decisions and actions are necessary if an animal becomes non-ambulatory. The dairy farmer or animal caretaker in charge must determine immediately whether the injured animal is otherwise healthy and can be nursed back to health or cannot be saved. If the non-ambulatory animal can be nursed back to health, protect it from further injury, provide it with shelter, food and water, and give it care to minimize its pain and discomfort during the recovery process.

Euthanasia is appropriate when an animal's quality of life is decreased or when pain and suffering cannot be alleviated. Personnel who routinely work with cattle need to be trained to recognize situations where euthanasia is the best option for the animal. Designated animal caretakers are trained to perform euthanasia through a preferred technique consistent with recommendations from the American Association of Bovine Practitioners and the American Veterinary Medical Association (2013). If the animal appears to be experiencing severe pain or distress, can't be saved or moved properly, has been chronically ill, or was recently treated with antibiotics requiring an extended withholding period, it is euthanized by a person appropriately trained in the procedure.

	YES	NO	DON'T KNOW/ N/A
The dairy has a written Herd Health Plan, developed in consultation with the herd veterinarian (or veterinary consultant), which includes specific areas for non-ambulatory animal management:			
Proper movement, including use of special equipment.			
Husbandry and nursing care that provides shelter, water, feed, isolation from other animals and protection from predators.	0		

CHAPTER 9 SPECIAL-NEEDS ANIMALS

	YES	NO	DON'T KNOW/ N/A
Prompt medical care.			
Euthanasia if warranted.			
	YES	NO	DON'T KNOW/ N/A
The dairy has a written Herd Health Plan, developed in consultation with the herd veterinarian (or veterinary consultant), which includes specific protocols for euthanasia consistent with recommendations from the American Association of Bovine Practitioners and the American Veterinary Medical Association:			
Training of animal caretakers on the need for and recognition of animals to be euthanized.			
Designated animal caretakers trained in proper technique(s).			
Confirmation of death.			
Record keeping of euthanized animals.			
Disposal of carcasses in compliance with local regulations.			

ENVIRONMENT AND FACILITIES

A hospital or sick pen isolates the animal(s) from the herd is part of best practice. Because sick or injured animals are more susceptible to discomfort than are healthy animals, it is important that the pen be equipped to maximize animal comfort. It provides adequate shade, bedding, air movement and accessibility to feed and water.

	YES	NO	DON'T KNOW/ N/A
Facilities are provided to segregate sick or injured animals; these facilities provide protection from weather.			
Self-locking stalls provide an emergency release for a non-ambulatory situation.			

HANDLING, MOVEMENT AND TRANSPORTATION

Non-ambulatory cattle that cannot be carried are moved with an appropriate sled, sling or bucket, with the exception of cases where an animal must absolutely be moved a short distance before an appropriate movement aid can be used (e.g. if a cow becomes non-ambulatory in a parlor).

Cattle are not pulled, dragged or otherwise moved through mechanical force applied directly to the animal, with the exception of specifically designed equipment for such purposes. In best practice, the prognosis of an animal is considered before the decision is made to move an animal. If the animal is highly unlikely to become ambulatory again, with little chance of recovery, the animal is euthanized and then moved (in accordance with the Herd Health Plan).

	YES	NO	DON'T KNOW/ N/A
Timely and prompt marketing of animals is part of the management plan.			
Designated animal caretakers have been trained and proper equipment is available to move non-ambulatory animals.			
Trained animal caretakers are available when sick, injured, non-ambulatory or dead animals must be moved.			



DAIRY BEEF

Dairy animals are an important source of beef in the United States. Approximately 20 percent of the nation's total beef production on an annual basis comes from the dairy sector, including fed dairy cattle and marketed cows and bulls. This chapter specifically focuses on marketed dairy cows, bull calves and freemartin heifers during their time on the dairy farm and considerations for their marketing as beef animals. For information on animal care for beef animals (including dairy steers) please follow guidelines of the Beef Quality Assurance Program.

	YES	NO	DON'T KNOW/ N/A
The dairy uses the "Top 10 Considerations for Culling and Transporting Dairy Animals" in marketing, handling and transportation			
decision making.			

DAIRY BULL CALVES AND FREEMARTIN HEIFERS

In best practice, all calves, whether to be raised as a replacement heifer, veal or dairy steer, receive colostrum or colostrum replacer and are fed in a way that promotes health and reduces the risk of disease. Please refer to Chapter 4: Newborn and Milk-Fed Dairy Calves for additional information on newborn calf animal care practices.

	YES	NO	DON'T KNOW/ N/A
Calves receive colostrum or colostrum replacer soon after birth, even if immediately transported off the farm.			
Calves receive a volume and quality of milk or milk replacer to maintain health, growth and vigor until weaned or marketed.			
Calves have access to palatable, clean, fresh water as necessary to maintain proper hydration.			

CHAPTER 11 THIRD-PARTY VERIFICATION

Confirmation by Third-Party Verifiers of the practices used by the FARM Program participants demonstrates the integrity of the program's animal care guidelines module and provides evidence to our stakeholders documenting the dairy industry's commitment to ethical care and well-being of dairy animals.

The objective of the FARM Program is not to identify winners and loser in animal care, but to set guidelines for care of dairy animals and to provide statistically verified data demonstrating that proper animal care is an expectation in the dairy industry.

In essence, when the dairy industry makes assertions about animal care based on participation in the FARM Program animal care on-farm evaluation, Third-Party-Verification ensures those assertions are measurably true.

	YES	NO	DON'T KNOW/ N/A
As part of the National Dairy FARM Program, the evaluated farm will participate in the random statistical sampling Third-Party			
Verification program.			





To learn more about the National Dairy FARM Program, log on to www.nationaldairyfarm.com

or call the National Milk Producers Federation at (703) 243-6111.