



SOMETHING SPECIAL

Understanding the client's goals for providing treats can help veterinary nurses give optimal recommendations.

NUTRITION NOTES

Treat Nutrition: The Why, How, and What of Proper Treating

Jessie Nelson, AAS, CVT, VTS (Nutrition)
Pima Medical Institute, Mesa, Ariz.

Kara M. Burns, MS, MEd, LVT, VTS (Nutrition)
Lafayette, Ind.

Pets play a vital role in the health and wellbeing of individuals and families, and pet owners love to reward and reinforce this bond with treats. Treats are a way of showing love to an animal companion, and the addition of treats to a balanced diet is common. Treats are also used as training aids to reinforce positive behaviors or aid with dental health. Given in excess, however, treats can lead to a nutritional imbalance in a pet's diet.



Treating is a subcategory of pet nutrition. The veterinary healthcare team should understand the “why” behind an owner’s need to provide treats and be prepared with appropriate recommendations for treats based on the individual pet and the owner when nutritional adjustments are needed.

THE POPULARITY OF PET TREATS

From 2020 to 2021, pet food became one of the top-selling consumer product goods categories in the United States. During this same time frame, pet treats performed even better, outpacing the growth of pet food and increasing 13.7% in sales and 11.3% in volume.¹ This increase reflects the role of pets in today’s society: owners are paying closer attention to their pet’s health and wellness and buy such products as a way to reinforce the bond with their pet. This trend seems likely to continue. One survey found that 32% of participating pet owners said they had purchased more pet treats during the pandemic.² Additionally, when anticipating needs for the coming year, treats came out on top again.^{1,2}

The increase in providing pets with treats has been ongoing since 2010,³ when 88% of dog owners and 65% of cat owners confirmed giving treats to their pets. A recent study found that more than half (57%) of the respondents admitted giving their dog 1 to several treats per day.⁴ Another 2% of respondents admitted giving more than 15 treats per day.

TREAT LABELING AND NUTRITIONAL ISSUES

Although treats are considered pet food, the Association of American Feed Control Officials (AAFCO) Model Pet Food Regulations acknowledge that the intended purpose of treat products is not to be a source of complete and balanced nutrition; thus, treats are not required to meet the nutritional adequacy requirements for a complete and balanced dog or cat food. To indicate this fact, labels on pet treat packages are required to clearly display the terms “snack” or “treat” on the front panel.⁵ If either of these terms appear on the label, the product is intended to be given in moderation. However, many clients may be unaware of this distinction.

Taking an in-depth nutritional history with open-ended questions to learn the extent and type of treat provision is an important part of the clinic visit for

BOX 1

Pet Products Without Nutritional Labels⁵

The following products are exempt from registration and labeling requirements, regardless of being flavor-coated, unless they make a nutritional claim (e.g., highly digestible, high protein):

- All chews, bones, toys, and exercisers made of animal skin, hide, wood, or manmade materials
- Hooves
- Ears
- Animal bones
- Ligaments
- Snouts
- Pizzles (bull penis)

every pet. Too many treats can add excess calories to the pet’s daily intake, causing a nutritional imbalance. The use of life stage–appropriate treats may reduce the risk of nutritional imbalance, but these treats can still be overfed.

In general, high-fat and/or high-calorie treats should be avoided, as these may result in gastrointestinal problems, pancreatitis, and obesity. Unfortunately, treats are not required to have full pet food labeling unless they make a claim, such as “nutritious,” “low-fat,” “highly digestible,” or “complete and balanced,” and many do not have a calorie content statement or guaranteed analysis on the packaging.⁵ This information should be readily available from the pet food manufacturer and can often be found on the manufacturer’s website or in a product guide. Some products are exempt from registration and labeling (**BOX 1**), unless the manufacturer makes any claim that the product is intended for use as an animal food or that it provides any nutritional value.⁵

APPROPRIATE TREAT AMOUNTS

Performing a nutritional assessment and obtaining an in-depth nutritional history are essential in developing a nutritional plan and recommendation for an individual pet. It is important to ask about everything the pet is eating. Even some items that clients may not consider treats should be included.

**BOX 2****Low-Calorie Vegetable Treat Options**

- **Carrot, 1 medium:** 25 kcal
- **Half cucumber:** 20 kcal
- **Green beans, 1 cup of ½" pieces:** 31 kcal
- **Celery stalk:** 7 kcal
- **Half zucchini:** 20 kcal

For example, rawhides and chew bones tend to be popular with clients as a way of keeping dogs occupied. However, the average rawhide can be over 100 kcal and some chew bones may be over 1000 kcal.⁶ That amount far exceeds most medium-size or smaller pets' daily energy requirement (DER).

To avoid nutritional imbalance, treats should not exceed 10% of the animal's total daily calories.^{7,8} When clients want to give treats manufactured by pet food companies, the nutritional content of each treat should be considered. Veterinary nurses can help find this information in reference guides, on appropriate websites, or by reaching out to the manufacturer. Then the type, size, and total amount of each treat can be discussed with the owner, along with how to work it into the animal's daily caloric intake. All these factors are important, as even the smallest treats can add up to enough kilocalories to cause a nutritional imbalance.

POTENTIAL TREAT HAZARDS

Sometimes, clients believe that more "natural" products or human foods are safer and healthier treats for their pets. While some of these options can be lower in calories (**BOX 2**), others pose potential hazards. For example, hard items such as bones and hooves can cause tooth fractures and foreign body obstructions. These and other animal products sold as treats (e.g., pigs' ears, pizzle sticks) can also transmit bacteria such as salmonella and *Escherichia coli* not only to the pet but also to the owners. Similarly, raw human foods can be subject to contamination with bacteria such as *Campylobacter* and *Toxoplasma*. Extra caution must be taken with such treats, especially if anyone in the pet's household is immunocompromised. The potential for zoonotic disease must be discussed with the pet owner and documented in the medical record.

Other common human foods or ingredients to caution clients about include xylitol, garlic, grapes, and chocolate. It is important to educate clients that even small amounts of foods that are harmless to people may be toxic to pets. Xylitol, for example, is a sweetener that is present in many human foods, including some brands of peanut butter, a common treat for dogs. However, xylitol can cause devastating liver injury in dogs. Garlic, chives, and onions can cause gastrointestinal irritation and may lead to red blood cell damage and anemia in pets. Grapes (and raisins) may lead to kidney disease. Chocolate can be fatal. Clients can be referred to the ASPCA website (aspca.org/pet-care/animal-poison-control/people-foods-avoid-feeding-your-pets) for useful articles on what human foods to avoid feeding their pets.

It is also important to be aware of product quality issues that may cause illness in pets. One ongoing issue being investigated by the U.S. Food and Drug Administration (FDA) is complaints of illnesses associated with consumption of chicken, duck, or sweet potato jerky pet treats. Most reports involve products imported from China, which produces most of the jerky pet treats on the market, and various sizes, ages, and breeds of dogs have been reported to be affected. The FDA believes an association between some of the reports and consumption of jerky pet treats exists.⁹ The FDA's investigation involves the unexpected occurrence of cases of acquired Fanconi syndrome (also called Fanconi-like syndrome, FLS). FLS is a rare kidney disease typically seen in certain breeds as a hereditary condition. With FLS, nutrients such as glucose, bicarbonate, and amino acids are lost into the urine instead of being reabsorbed as part of normal kidney function.

RECOMMENDING TREATS

With so many factors to consider, veterinary healthcare team members are often faced with the question, "What treats can you recommend?" Since each patient is an individual, no single treat is best for every patient. However, some simple questions about what the patient and the client prefer (and why) can help the veterinary nurse and client come to some decisions together. Is there a certain texture or smell that the pet enjoys? What is the client's budget? Is the client trying to keep the pet occupied, or do they want an interactive treat? Answers to these questions, in addition to consideration of the patient's signalment and activity level and the nutritional plan being recommended, can help guide recommendations.



Human Foods

Some fruits and vegetables are appropriate for pets, and they often contain fewer calories than most commercial treats (**BOX 2**). In addition, the client gets the satisfaction of giving their beloved pet a “healthy” treat. Clients who associate treats with being chewy or crunchy might even want to consider purchasing a dehydrator to make dry vegetable chews.

Still, it is important to be cognizant of the patient’s health history, even when recommending vegetables. For example, carrots, celery, green beans, parsnips, and summer squash contain oxalate, which is a building block for calcium oxalate. If a patient has a history or is prone to developing calcium oxalate uroliths, these vegetables should not be recommended.

Fresh fruit such as blueberries and cranberries can be a good low-calorie treat for most dogs. They contain antioxidants, fiber, vitamin C, and vitamin K, which help to support the immune system and contribute to a dog’s overall health.¹⁰ However, many fruits are higher in sugar and calories and, like all treats, should be given in moderation.

Pet Food

Many pets truly want the attention of their owner more than a specific treat, so another option is to use a portion of the pet’s regular food as a treat. For this purpose, the veterinary nurse can calculate the patient’s DER and have the owner hold 10% of that total in a special “treat” bag to be given to the pet throughout the day. This reduces the incidence of gastrointestinal upset and avoids the problem of extra calories.

Enrichment and brain stimulation can also be used as “treat” techniques. The pet’s regular kibble can be placed into dispensing toys and food puzzles, hard rubber objects for chewing, and seek-and-find mats, all requiring the pet to “earn” its meals. Additionally, this activity makes the animal expend energy, which helps burn extra calories it may get from treats. For pets that like to chew, canned food can be placed inside a rubber toy and frozen for chewing as it melts. However, if the food is too hard, tooth fracture is possible, so clients should exercise caution.

Homemade Treats

If the client is willing to spend some time preparing food, moist or semi-moist food can be baked or

dehydrated into homemade treats. Canned moist food can be used or dry kibble can be ground to powder in a blender and water added to create a dough. Either can be cut into quarter-inch thick slices or rolled out and then cut into shapes. Using cookie cutters can make the resulting treats fun for clients as well as pets! The treats can then be baked on an ungreased cookie sheet at 350°F for approximately 30 minutes or until they are a desired crispiness. Clients should be advised to store the baked treats in the refrigerator and to discard any left after 5 to 7 days.

Therapeutic Diet Treats

For pets that are on a therapeutic diet for a specific disease condition, care must be taken to not upset the nutrient balance and key nutrients aimed at managing the disease process. Engaging the pet owner in a treat discussion is just as important at this time, and the veterinary team must be active educators in making recommendations. Eliminating treats at this point will not be in the best interest of the patient or client, who may give inappropriate treats and alter or counteract the nutritional regimen aimed at managing the disease process. Rather, the veterinary nurse should have a discussion of nutrients and how certain nutrients help to manage the disease condition. Then proper treats should be discussed with the client and a recommendation made.

A number of commercially manufactured treats align with the nutrient specifications of therapeutic foods to maintain the efficacy of the therapeutic nutritional plan. Often, the research results for the development of the therapeutic diet are applied to the treats and their formulation, so the treats have the same formulation as the therapeutic food but are made in a different size and shape. Thus, the veterinary team can make a complete nutritional plan and recommendation, including treats, for a patient with a specific disease condition. Addressing this at the outset of nutritional management allows the client to continue showing their affection while not counteracting the proper management of disease.

CONCLUSION

Giving treats is a popular way for pet owners to show affection to their pets. Veterinary healthcare team members know this behavior is taking place; therefore, it is imperative to investigate and ascertain owner treat-feeding regimens as part of the nutritional history.



Jessie Nelson

Jessie earned her associate degree in applied science, emphasis in veterinary technology, in 2009. While working in a veterinary internal medicine practice, she developed her passion for nutrition. She then went on to pursue a VTS in nutrition. Jessie is currently the clinical director for Pima Medical Institute, where she shares her knowledge with future veterinary nurses/technicians.



Kara M. Burns

Kara is a licensed veterinary technician with master's degrees in physiology and counseling psychology. Kara is the founder and past president of the Academy of Veterinary Nutrition Technicians and has attained her VTS (Nutrition). She is the editor in chief of *Today's Veterinary Nurse*, works as an independent nutritional consultant, and is a past president of NAVTA. She has authored many articles, textbooks, and textbook chapters and is an internationally invited speaker.



Veterinary nurses should look critically at treat labels and encourage owners to do the same. Educating pet owners regarding proper treats allows for open communication and discussion and aids in understanding the veterinary healthcare team's recommendation for a nutritional plan. This education leads to client compliance and proper nutrition for pets. **TVN**

Resources

- The United States Department of Agriculture National Nutrient Database for Standard Reference is a useful resource to determine the calorie content of human foods: nal.usda.gov/fnic/foodcomp/search
- The ASPCA Poison Control Center provides many resources for pet owners, including a quick-reference list of common, potentially toxic human foods: aspca.org/pet-care/animal-poison-control/people-foods-avoid-feeding-your-pets

References

1. Phillips-Donaldson D. Pet food ranks among top-selling consumer product goods. Published August 12, 2021. Accessed September 12, 2021. petfoodindustry.com/blogs/7-adventures-in-pet-food/post/10541-pet-food-ranks-among-top-selling-consumer-product-goods
2. Driggs J. Consumer connect: pet products shopping snapshot. Published July 2021. Accessed September 12, 2021. retailwire.com/wp-content/uploads/2021/08/Consumer_Connect_Q2-2021-Summary_Pet_F.pdf
3. Crane SW, Cowell CS, Stout NP, et al. Commercial pet foods. In: Hand MS, Thatcher CD, Remillard RL, et al., eds. *Small Animal Clinical Nutrition*. 5th ed. Mark Morris Institute; 2010.
4. Morelli G, Marchesini G, Contiero B, et al. A survey of dog owners' attitudes toward treats. *J Appl Anim Welfare Sci*. 2020;23(1):1-9. doi: 10.1080/10888705.2019.1579095
5. Association of American Feed Control Officials. Treats and chews. Accessed September 10, 2021. talkspetfood.aafco.org/treatsandchews
6. Freeman L, Linder D, Heinze C. What are safe and healthy treats for my pets? Published January 5, 2016. Accessed September 12, 2021. vetnutrition.tufts.edu/2016/01/what-are-safe-and-healthy-treats-for-my-pet
7. Burns K. Helping an overweight dog lose weight. *Clinician's Brief*. Published Nov/Dec 2018. Accessed September 10, 2021. cliniciansbrief.com/article/helping-overweight-dog-lose-weight
8. Fascetti A, Delaney S. Feeding the healthy dog and cat. *Appl Vet Clin Nutr*. 2012;(7):75-94.
9. U.S. Food and Drug Administration. FDA investigates animal illnesses linked to jerky pet treats. Updated August 21, 2018. Accessed October 10, 2021. fda.gov/animal-veterinary/outbreaks-and-advisories/fda-investigates-animal-illnesses-linked-jerky-pet-treats
10. Nestle Purina. Can dogs eat blueberries? Accessed September 10, 2021. purina.com/articles/dog/nutrition/can-dogs-eat-blueberries



Veterinary Technology Bachelor's Degree

Accelerate your career path with our online bachelor's completion program.

Online | Self-paced | Affordable

- ✓ AVMA-CVTEA FULLY ACCREDITED
- ✓ CUSTOMIZABLE PAYMENT PLANS

700G

Call: 888.427.1700 ext 1009 | Visit: Pennfoster.edu/TVN

Enter ID# **AEWS12V** to enroll online

Penn Foster College, Administrative Office 14300 N. Northsight Blvd., Scottsdale, AZ 85260