



Lisa M. Freeman, DVM, PhD, DACVN Cummings School of Veterinary Medicine Tufts University North Grafton, Massachusetts

# Pet Food Myth Busters: Answering Common Questions Owners Ask About Pet Food

any owners make decisions about pet foods based not on fact, but on the many current myths and misconceptions that prevail. The first step to dispelling pet food myths is to be aware of what your patients are eating.

A complete diet history for every patient at every visit is important for a number of reasons. Knowing what a patient is eating can help to diagnose health concerns—for example, if owners are feeding an unbalanced homemade or vegetarian diet; foods with potential hazards, such as raw meat diets (or other raw products, such as rawhides, bully sticks, or freeze-dried treats); commercial diets that are not nutritionally complete and balanced; or diets manufactured by companies with questionable nutritional and quality control protocols. The diet history also can help to determine whether the current diet is optimized for maintaining health or, in the case of animals with medical conditions, for helping to manage disease.

Providing reliable nutrition resources and helping owners understand how to make more objective decisions about what they read or hear can help to ensure their pets are receiving optimal nutrition.

In addition to collecting information on the animal's current diet, which includes the pet food, treats, table food, rawhides, dental products, dietary supplements, and foods used to administer medications, it also is important to make a specific recommendation about the animal's diet. This may be as simple as saying, "You're feeding an excellent diet to Fluffy and are keeping her in perfect body condition. Keep up the good work!" Supporting sound nutrition decisions can help to reinforce these behaviors and makes it less likely that the owner will seek out nutritional information from other less reliable sources. Conversely, if the owner is feeding a diet that is not optimal, make a specific recommendation for a more appropriate diet (or treats, supplements, etc) and explain why you're making this recommendation. Providing reliable nutrition resources and helping owners understand how to make more objective decisions about what they read or hear can help to ensure their pets are receiving optimal nutrition. In addition, it is important for the veterinary healthcare team to be prepared with answers to common questions and to be able to debunk myths. Some of the common questions owners ask are below.<sup>a</sup>

#### **COMMON MYTHS**

### What is the best food to feed my pet?

Despite all the marketing claims to the contrary, there is no best diet for all pets. Every pet is unique, so the goal is to find the best food for the individual pet. Expense doesn't necessarily equate with quality. Some inexpensive foods have years of rigorous scientific testing behind them and some very expensive foods lack vital nutrients or are based on unsound science. Larger companies generally have more stringent quality control protocols, employ expert nutritionists and food scientists, and strive to increase collective nutrition knowledge through re-

<sup>a</sup>Modified from Tufts University's Cummings School of Veterinary Medicine Nutrition website: http://vet.tufts.edu/nutrition/faq/general\_pet\_nutrition.html).

search. Smaller manufacturers may have less control over ingredient or final product quality, perform less laboratory testing, and are less likely to employ full- or part-time veterinary nutritionists.

# Is the ingredient list a good way to determine the quality of a pet food?

Although ingredient lists are commonly used by lay people to determine the quality of pet foods, this approach has many pitfalls and can be subject to intentional manipulation by the food manufacturer. Ingredients are listed on labels in order of weight, including water, so ingredients with high water content (like fresh meats and vegetables) are listed before similar amounts of dry ingredients, even though they may contribute fewer nutrients overall.

Pets require nutrients, not ingredients. A food full of great-sounding ingredients can be less nutritious than one containing less appealing (to people) ingredients. Some manufacturers may add ingredients to products solely for marketing purposes, to increase the appeal of the food to consumers. These ingredients may have unproven benefits, be present in miniscule amounts, and provide nothing to the food but added expense. More ingredients also mean increased quality control measures (and more time and expense) are necessary to ensure that the finished product adheres to the desired nutrient formulation.



# My friend says that grains are bad for dogs. Is this correct?

Whole grains, rather than being fillers, contribute valuable nutrients including protein, vitamins, minerals, essential fatty acids, and fiber to foods while helping to keep the fat and calories lower than if animal products were used in their place. Even refined grains such as white rice can have beneficial health implications depending on the type of food and the pet. Dogs and cats can efficiently digest and use nutrients from grains. Allergies to grains (and even to animal proteins such as chicken, beef, and dairy) are actually very uncommon in dogs and cats.

It is becoming more common in the saturated pet food market for manufacturers to perpetuate myths to sell products and increase market share. Grain-free foods are often an example of this strategy. Many such products merely substitute highly refined starches such as those from potatoes or tapioca in place of grains. These ingredients often provide fewer nutrients and less fiber than whole grains while costing more.

### I read online that by-products can include hair, hooves, and floor sweepings. Is this true?

By-products are commonly vilified, often by pet food manufacturers that are trying to carve out market share for themselves. By-products (mainly organ meats and entrails) often provide more nutrients than muscle meats on a per-weight basis and are important components and even delicacies of human diets in other countries. The term by-product indicates that the ingredient is a leftover from animal carcasses once the desirable (for Americans) muscle meat has been removed. The Association of American Feed Control Officials (AAFCO) definitions of mammalian by-products specifically exclude hair, hooves, horn, hide trimmings, manure, and intestinal contents as well as anything that is not specifically part of the carcass (eg, floor sweepings). As with all ingredients, the quality of by-products can vary, so it is important to select manufacturers that have stringent internal quality control standards.

### I've heard that raw diets prevent and/or solve a lot of health problems in pets. Is this true?

Despite anecdotal reports from pet owners and even some veterinarians, there is currently no evidence that raw foods offer any benefits over cooked ones. There is substantial evidence, however, that raw foods may be associated with nutritional deficiencies, bacterial and parasitic infections, and other health concerns in pets. These foods also pose potential risk to people—especially those that are immunocompromised, such as young children, the elderly, and patients receiving immune-modifying drugs or who have cancer.

Pets that eat contaminated raw foods have been demonstrated to shed viable pathologic organisms in their feces, and it is likely that areas that they frequent also are contaminated. As numerous recalls and some pathogen surveys in the last few years have proven, all raw meat, regardless of source, should be considered to be contaminated until proven otherwise.

In addition to food safety concerns, nearly all home-prepared raw diets and many commercially available raw products are deficient in essential nutrients. It is also common for commercial raw products to be very high in fat, which may not be tolerated by some animals. Check the list of recommended websites at the end of this article for information about raw meat diets.

# Are home-cooked foods healthier for my pet than commercial products?

High-quality commercial pet foods have been tested over decades to provide adequate nutrition for the dog or cat. With the exception of some pets with multiple or severe health concerns, there is a commercial food that is appropriate for every pet, and nutriThere is substantial evidence that raw foods may be associated with nutritional deficiencies, bacterial and parasitic infections, and other health concerns in pets. These foods also pose potential risk to people.



With the exception of some pets with multiple or severe health concerns, there is a commercial food that is appropriate for every pet, and nutritional deficiency diseases are rare in pets that are fed good quality commercial products.

tional deficiency diseases are rare in pets that are fed good quality commercial products. While home-cooked foods allow more control of ingredients and customization to the specific pet, most home-cooked food recipes are not formulated by a qualified veterinary nutritionist and are vague and deficient in multiple essential nutrients, making them much less nutritious than commercial foods.

Even when the recipe is nutritionally balanced, there is no evidence that the average animal receives better nutrition from a homecooked food than a commercial food. For the vast majority of pet owners, commercial pet foods offer the best nutrition with the most convenience and affordability.

# What is the best diet for a growing puppy or kitten?

Growing kittens should be fed a kitten food or an "all life stages" formula until 1 year of age. Growing small- and medium-breed puppies need a puppy or "all life stages" formula until 1 year of age. Large- and giant-breed puppies (adult size >50 lb) need a food specifically designed for large-breed puppies until 12 to 18 months of age. It is ideal if the product has passed AAFCO feeding trials rather than merely being "formulated to meet" the nutrient profiles for growth. Throughout growth, it is important to keep a puppy or kitten lean to reduce risks for health problems and to optimize its life span. Spaying or neutering reduces calorie requirements, so it

is important to reduce calories after surgery to reduce the risk for obesity.

### HELPING OWNERS TO MAKE INFORMED DECISIONS ABOUT PET FOOD

An owner's decision about what to feed his or her pet has become a more complicated question than it once was. There is no single "best" food for all pets because optimal diet(s) depends on many factors, such as life stage, body condition, exercise (or lack thereof), environment, and health status. Often owners base their decisions on marketing messages rather than objective nutritional data. Although there are limitations, the information provided on a pet food label can provide helpful guidance for making objective selections of appropriate foods. The two most useful pieces of information on a pet food label are the nutritional adequacy statement and the manufacturer.

### **Nutritional Adequacy**

The **AAFCO** adequacy statement must be included on all pet food labels in the United States. This statement confirms three important facts:

- 1. Whether the diet is complete and balanced. All over-the-counter foods should be complete and balanced. If the statement reads "for intermittent or supplemental use only," it is not complete and balanced. The product may be acceptable as a veterinary therapeutic food to be used for a specific purpose—eg, in a case of severe kidney disease—but should be avoided for everyday feeding.
- 2. If the food is complete and balanced, for which life stage is it intended? AAFCO provides nutrient profiles and feeding trial requirements for growth, reproduction, and adult maintenance but not for senior/geriatric status. A food that is formulated to meet the AAFCO profiles for all life

stages must meet the minimum nutrient levels for both growth and adult maintenance.

- 3. How did the company determine that the food is complete and balanced? Labels may include one of two statements regarding nutritional adequacy:
  - "[Product name] is formulated to meet the nutritional levels established by the AAFCO Dog (Cat) Food Nutrient Profiles for [life stage(s)]." This determination is based either on the recipe or on analytic testing of the finished product (preferably the latter).
  - "Animal feeding tests using AAFCO procedures substantiate [product name] provides complete and balanced nutrition for [life stage(s)]." Feeding trial evaluation of food is the basis of this statement. While feeding trials help to test for the food's nutritional adequacy, they do not guarantee that the food provides adequate nutrition under all conditions.

In addition, I recommend that foods also be selected based on the important criteria below to help to ensure that the food is made by a reputable and knowledgeable company with strict quality control measures:

#### THE MANUFACTURER

The manufacturer's name and contact information should be provided. The manufacturer should then be contacted for answers to the following questions:

- 1. If the product is tested using AAFCO nutrient profiles rather than feeding trials, does it do so by formulation or by analysis of the finished product? The latter is preferable.
- 2. Do they employ a full-time qualified nutritionist? What is this nutritionist's name

- and qualifications? Appropriate qualifications are either a PhD in animal nutrition or board certification by the American College of Veterinary Nutrition or the European College of Veterinary Comparative Nutrition. Who formulates their foods and what are his/her credentials?
- 3. Where are their ingredients produced and their food manufactured?
- 4. What specific quality control measures do they use to assure the consistency and quality of ingredients and the end product? Examples include certification of a manufacturer's procedures (eg, by Hazard Analysis and Critical Control Points, Global Food Safety Initiative, or American Feeding Industry Association); testing ingredients and end products for nutrient content, pathogens, and aflatoxins; materials risk assessments; and supplier audits.
- 5. Can they (and will they) provide information on levels for any requested nutrient (protein, phosphorus, sodium, etc) for the dog or cat food in question? An average/typical analysis is preferable as a guaranteed analysis provides only the minimums or maximums and not an exact number. These values should ideally be given on an energy basis (ie, grams per 100 or 1,000 kilocalories) rather than on an "as fed" or "dry matter" basis. The latter two do not account for the variable energy density of different foods.
- 6. What is the caloric value per gram, can, or cup of the food?
- 7. What kind of product research has been conducted? Are the results published in peer-reviewed journals?

If a manufacturer cannot/will not provide any of this information, one should be cautious about using that brand. If a manufacturer cannot/will not provide any of this information, one should be cautious about using that brand.

#### **RECOMMENDED WEBSITES**

#### **Nutrition Guidelines**

- World Small Animal Veterinary Association Nutritional Assessment Guidelines
- wsava.org/educational/ global-nutrition-committee
- American Animal Hospital Association Nutritional Assessment Guidelines
  - aahanet.org/Library/NutritionalAsmt.aspx

#### Tools for the Veterinary Health Care Team

- World Small Animal Veterinary Association Nutrition Toolkit
  - wsava.org/nutrition-toolkit
- Pet Nutrition Alliance
  - petnutritionalliance.org/

## Pet Nutrition – General Information for Pet Owners

- National Research Council downloadable booklets: Your Dog's Nutritional Needs and Your Cat's Nutritional Needs
  - dels.nas.edu/global/banr/petdoor
- World Small Animal Veterinary Association Nutrition Toolkit (The Savvy Dog Owner's Guide to Nutrition on the Internet, The Savvy Cat Owner's Guide to Nutrition on the Internet, and Selecting the Best Food for Your Pet)
  - wsava.org/nutrition-toolkit

## Pet Nutrition – General Information for Veterinarians (Nutrition Myths)

- Cummings School of Veterinary Medicine at Tufts University Nutrition Service
   Frequently Asked Questions
   vet.tufts.edu/nutrition/faa
- Nestlé Purina Nutrition Myths
  - purinaveterinarydiets.com/ healthandnutrition/myths/default.aspx
- P&G Deciphering Fact from Fiction (co-written by Dr. Freeman)
  - iamsvetformula.com/loadFactFrom Fiction.do

#### **Commercial Pet Food**

- Association of American Feed Control Officials: Information on regulations, labeling, and other important facts about pet food
  - petfood.aafco.org/
- FAQs about pet foods
  - vet.tufts.edu/nutrition/faq
- Federal Drug Administration (FDA) Pet Food site: Information, links, food safety issues, recalls, pet food labels, reporting portal
  - fda.gov/AnimalVeterinary/Products/ AnimalFoodFeeds/PetFood/default.htm
- Pet Food Institute: Information on ingredient definitions, nutrition myths, labeling regulations
  - petfoodreport.com

#### **Home-Cooked Pet Food**

- Cummings School of Veterinary Medicine at Tufts University Nutrition Service Frequently Asked Questions
  - vet.tufts.edu/nutrition/faq
- American College of Veterinary Nutrition: Listing of board-certified veterinary nutritionists who will formulate nutritionally balanced homemade food recipes for veterinarians and/or pet owners
- acvn.org
- BalancelT: Commercial website that offers semi-customized balanced homecooked food recipes for pet owners with healthy pets. Veterinarians can customize preformulated recipes for animals with medical conditions.
  - balanceit.com

#### **Dietary Supplements**

- Consumerlab: Site (with a small subscription fee for use) that independently evaluates dietary supplements (primarily for human supplements but some pet supplements are included)
  - consumerlab.com

- Food and Drug Administration (FDA):
   Regulatory and safety issues of dietary supplements, adverse event reporting
  - fda.gov/food/dietarysupplements/ default.htm
- Mayo Clinic Drugs and Supplements Information: Fact sheets on human supplements and herbs
  - mayoclinic.com/health/ drug-information/DrugHerbIndex
- National Institutes of Health (NIH) Office of Dietary Supplements: Evaluating supplements, fact sheets, safety notices, internet health info
  - ods.od.nih.gov
- United States Department of Agriculture (USDA) Food and Nutrition Information Center: General supplement and nutrition information, links to a variety of dietary supplement websites
  - fnic.nal.usda.gov/dietary-supplements
- United States Pharmacopeia Dietary Supplement Verification Program: Independent testing of dietary supplements (human supplements only) – usp.org/dietary-supplements/overview

#### **Raw Meat Diets**

- Cummings School of Veterinary Medicine at Tufts University Raw Diet Fact Sheet

   vet.tufts.edu/nutrition/faq
- Freeman et al. Current knowledge about the risks and benefits of raw meat-based diets for dogs and cats. JAVMA 2013; 243: 1549-1558 (free access).
  - avmajournals.avma.org/doi/abs/ 10.2460/javma.243.11.1549

#### Other

- Ohio State Indoor Pet Initiative: Nutrition and other tips for optimizing the indoor pet's environment
  - indoorpet.osu.edu/
- USDA Nutrient Database: Full nutrient profiles on thousands of human foods
   nal.usda.gov/fnic/foodcomp/search

30 Pet Food Myth Busters