

**Dog Tips** 

**Cat Tips** 

# The Pet Food Producers Who Are Going Beyond the Basics

AAFCO is the regulatory authority for pet food in the US, but incredibly, pet food producers aren't even required to do the minimal feeding studies - on six dogs - to ensure nutritional adequacy. These pet food producers are bucking the trend and taking extra steps to do right for our pets.

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### STORY AT-A-GLANCE

- AAFCO (Association of American Feed Control Officials) pet food feeding trials are both voluntary (for manufacturers) and significantly under-powered for purposes of judging the nutritional adequacy of pet food formulas
- Fortunately, a growing number of pet food producers are going beyond the basics of AAFCO trials to ensure they're getting a more accurate picture of formulations being tested
- One of the enhancements some pet food companies are employing is in-home vs. laboratory studies involving family pets vs. "purpose-bred" lab animals
- Other enhancements include longer trials, measuring additional nutrient and biologic parameters, and up to three times as many pets per study

A recent article in a pet food industry journal titled "The expectations and limitations of feeding trials," <sup>1</sup> illustrates a point I always make when discussing the significant drawbacks to feeding dogs and cats ultraprocessed diets over a prolonged period (often a lifetime).

## **AAFCO Feeding Trials Are Far From Comprehensive**

The regulatory authority for pet food in the U.S. is the Association of American Feed Control Officials (AAFCO), a voluntary membership association of local, state, and federal agencies charged with providing guidelines for animal feeding studies meant to determine the nutritional adequacy of pet food diets. AAFCO studies must meet the following (meager) requirements:

- The study must last six months
- A veterinary exam is performed at the beginning and end of the study
- Two of the eight dogs can be removed from the study for non-nutritional reasons
- Eight healthy adult dogs must start the study
- Dogs are weighed weekly, and the following criteria must be met:
  - No dog may lose more than 15% of its body weight throughout the study
  - The average weight loss of the entire group cannot be greater than 10% for the six-month duration

- Four blood parameters are collected at the end of the study:
  - Alkaline phosphatase
  - Hemoglobin
  - Hematocrit
  - Albumin

It goes without saying there's a lot missing from the above guidelines, for example, other health markers, nutrient assimilation, and significantly, the potential long-term effects of feeding a diet. The reality is that the "gold standard" AAFCO feeding trial the major ultraprocessed pet food companies use to label their foods as appropriate to feed for a lifetime only requires eight adult dogs, and only six must still be alive at the end of the 6-month trial period for a passing grade.

The dogs don't undergo any nutritional baseline testing at the beginning of the trial that would be the best barometer of how the food sustained the dogs after the trial was complete. In addition, none of the four blood parameters measured at the end of the study directly correlates to nutrient levels in the body (hemoglobin, packed cell volume, serum alkaline phosphatase and albumin).

There's no measurement (before or after the feeding trial) of the animal's actual level of nutritional intake: no measurement of vitamin levels (including vitamins D, E, A or B vitamins), no calcium, phosphorus, potassium, magnesium, iron, copper, manganese, zinc, iodine, or selenium levels are required to be measured.

So how on earth can this be the "gold standard" by which we measure a lifetime of nutritional adequacy when we aren't actually measuring nutrition intake at all? (Not to mention no digestion and assimilation requirements).

This is just one example of how the ultraprocessed pet food industry has failed consumers; labeling their products as "scientifically formulated, undergoing rigorous clinical trials to assure nutritional adequacy" when nothing could be further from the truth.

"These studies are really designed to show that an animal can 'survive' on a food and not 'thrive' on a food," Ryan Yamka, Ph.D., vice president and head of research and development for The Farmer's Dog told the journal.

"Other feeding trials that companies will use are digestibility, stool quality and urinary pH in cats. Although not required for foods to enter the marketplace, the companies that perform their due diligence before they launch a product will run these studies to ensure the food is truly biologically appropriate before entering the market."<sup>2</sup>

Assessing serum nutrient levels, pre and post feeding trial (including DHA and EPA), as well as the test subjects' microbiome at the beginning and end of the trial period would also assist in demonstrating whether or not diets are biologically appropriate, but that's certainly not going to happen in the foreseeable future.

## **Going Beyond AAFCO Requirements**

The good news is that pet food producers who want to thoroughly test new diets can and often do go beyond AAFCO requirements, including JustFoodForDogs. According to the company's founder, Shawn Buckley:

"What a feeding trial can tell you depends upon how you conduct that trial. We believe that the minimum requirements of the AAFCO feeding trial are elementary — despite being considered the Gold Standard of the industry for proving nutritional adequacy.

Most veterinarians and scientists agree that AAFCO feeding trials can miss identifying deficiencies that take longer than six months to develop or are not detectible by the rudimentary bloodwork required in the protocol. Simply put, if you test for a short enough period and you examine only minimal bloodwork, you may not ever see deficiencies that might exist."<sup>3</sup>

The team at JustFoodForDogs has expanded the existing AAFCO requirements to ensure they're getting a more accurate picture of formulations being tested. According to Buckley, the company has successfully completed AAFCO feeding trials with enhanced or additional requirements, including:

- 12-month vs. 6-month trials
- Full CBC analysis vs. only the 4 measures required by AAFCO
- 25+ dogs required to finish the trials vs. the 6 required by AAFCO

In addition, the research was conducted through a partnership with a veterinary college and the animal health science department of a major university, and the dogs used in the study were pets vs. "purpose bred" (laboratory) dogs. Even some feed-grade producers are taking their new formula studies up a notch:

"At Champion Petfoods, we regularly add on additional tests for our Orijen and Acana pet foods, like more indepth bloodwork, echocardiograms and urine data, to provide us with more information and ensure our complete confidence in the food being tested," said Janelle Kelly, M.Sc., nutrition research scientist for Orijen and Acana pet food.

"Pets are members of our families, and we want to support their long-term health with the most optimal recipes possible."

## **In-Home vs. Laboratory Studies**

Another problematic aspect of feeding trials is that they're typically conducted in a controlled environment (a laboratory) supervised by veterinary staff, using "purpose-bred" Beagles or domestic shorthair cats.

According to Yamka, "There are some benefits to performing these types of studies like cost, control of the environment and compliance. In a controlled setting, the dog or cat is always under veterinary supervision and you do not have to worry about a consumer giving the dog or cat treats, or a dog getting into the garbage or eating a dead squirrel in the backyard."

However, another option some pet food companies use is the in-home feeding trial, which can provide a more natural picture of the viability of a new formula and new information on alternative populations of dogs and cats. The at-home option can be very appealing to companies looking to conduct longer studies, or studies with a wider variety of pets.

The downside is that at-home studies involve a lot of variability, such as the amount of food fed, along with differences in environment, exercise routines, and owner compliance. One company that has tried the in-home feeding trial approach is The Honest Kitchen.

"We believe it's logical that dogs living with families in normal home environments would experience less stress, more enrichment and social contact, and an overall higher welfare standard than those who reside in a test-kennel or other laboratory or the types of test-site settings where feeding trials typically take place," said Lucy Postins, founder and chief integrity officer at The Honest Kitchen.

"As a brand, allowing dogs to live in the comfort of their own familiar surroundings allowed us to both prove the health-sustaining benefits of our foods in a scientific manner, in a way that we felt was the most conscientious, humane way possible."

The Farmer's Dog conducts its version of "real world" feeding trials by expanding the AAFCO-standard four blood markers to a full blood panel that measures 49 blood values. The company also uses different breeds of dogs of mixed ages and sizes and runs trials for a minimum of 1+ years. During the trials, "All dogs lived normal lives within their households with routine veterinary exams," according to Yamka.

"We have to keep in mind that a controlled setting for a trial may be the standard; however, it does not always translate into the real world," said Yamka. "A great example would be palatability, weight loss or other therapeutic studies."

## Shouldn't Feeding Trials Be the Industry Standard?

Believe it or not, even the current poorly designed, rudimentary feeding trials aren't required to put a pet food on the market, and in fact, they aren't all that common. Pet food producers who routinely perform their own trials would like to see them become standard, whether conducted in a laboratory or in pets' homes.

"There are pros and cons to each," said Buckley. "It seems like the challenge would be finding an independent, reputable research institution, and we think this can be done through universities operating in these fields. If a truly qualified team is conducting the trials, then the design of the experiment and analysis of the data will be reliable regardless of where the dogs are living."

#### Per Postins:

"We'd like to see more pet food brands strive to get a more complete picture of overall health and wellbeing in their trials, and for welfare to be given a higher priority for food testing across the industry."

#### **Sources and References**

1, 2, 3, 4 PetfoodIndustry.com, August 2022