

## FEED REGULATIONS AND QUALITY CONTROL IN THE FEED INDUSTRY

*Elizabeth Koutsos, PhD,<sup>1\*</sup> Virgil Strobel,<sup>2</sup> and Mark Griffin, PhD<sup>1</sup>*

*Mazuri Exotic Animal Nutrition, Purina Mills International*

*<sup>1</sup> Suite 500, 555 Maryville University Dr, St. Louis, MO 63141; <sup>2</sup>505 N. Fourth St, Richmond, IN 47374*

### Extended Abstract

The impact of state and federal regulations and internal quality control in the manufacture of quality animal feed is substantial. First, federal and state governments are responsible for administration of feed laws, in order to protect the consumer and the manufacturer. The Food and Drug Administration (FDA) regulates animal feed under the Food, Drug and Cosmetic Act. State Departments of Agriculture, under their commercial feed laws, regulate the manufacture and distribution of commercial feed within their state. The Association of American Feed Control Officials (AAFCO)<sup>1</sup> consists of feed control officials, and the organization's purpose is to create clarity and uniformity among state and federal feed control rules and regulations. FDA cooperates with AAFCO and the States for the implementation of uniform policies for regulating the use of animal feed products. This includes the establishment of uniform feed ingredient definitions and proper labeling to assure the safe use of feeds. All feeds and feed ingredients must be properly labeled prior to shipment. FDA and the state regulatory authorities have inspection authority in manufacturing facilities and may conduct inspections for surveillance (routine) and "for cause" inspections. Inspectors may sample products for nutritional guarantee compliance as well as feed contaminants. Second, and of major importance in many collections of exotic animals, is the use of medication in feeds. The Minor Use and Minor Species Animal Health Act of 2004<sup>2</sup> legislation governs the ability to provide medication for minor uses and minor species (defined as all animals except humans, cattle, horses, swine, chickens, turkeys, dogs and cats). At this time, there are a very limited number of approved drugs for exotic animals<sup>3</sup>. The Animal Medicinal Drug Use Clarification Act of 1994<sup>4</sup> provides for use of a drug in a manner that is not in accordance with the approved labeling, in order to treat an animal when the "health of the animal is threatened or suffering or death may result from failure to treat." Thus, a veterinarian (required component for this use) is permitted to use approved human and animal drugs in an extra-label manner. However, the extra-label use of animal drugs in feeds is explicitly prohibited. FDA has issued a Compliance Policy Guide (615.115)<sup>5</sup> for Extra-Label Use of Medicated Feeds For Minor Species, although there are conditions that must be satisfied in order to use: 1) Veterinarian involvement; 2) Treatment only use; 3) No production use; and, 4) No feed reformulation or re-labeling. Feed must be manufactured and labeled as approved for use in a major species. Again, this results in an inability to produce medicated diets for exotic animals. Further, the risk of cross-contamination of other feeds with drugs that may be toxic or harmful to species for which the drug is not intended provides further impetus for cautious use of medications in the feed manufacturing facility. Finally, additional measures to ensure quality of feed are also critical. The International Organization for Standardization provides guidelines for certification of ISO 9001:2000<sup>6</sup> quality management systems, which supports the development, maintenance, and testing of all manufacturing practices according to a standard set of parameters. Certification (by an outside accrediting agency) as ISO 9001:2000 ensures that these

parameters are implemented, and that quality is a driving force in all aspects of manufacturing. When applied to the feed manufacturing industry, this certification ensures that feed manufacturing, from development of the product to routine manufacturing, is closely monitored, and that the efficacy and safety of the production methods and final product are also evaluated. In summary, manufacturing quality feed is a complicated process governed by federal and state regulations, and driven by internal and external quality assurance processes. A quality product can only be achieved if recognized and assessable standards for quality manufacturing are implemented, routinely evaluated, and regularly improved.

#### **LITERATURE CITED**

1. <http://www.aafco.org/>
2. <http://www.fda.gov/cvm/Documents/S741Enrolled.pdf>
3. <http://www.nrsp-7.org/mumsrx/>
4. <http://www.fda.gov/cvm/Images/530.pdf>
5. [http://www.fda.gov/ora/compliance\\_ref/cpg/cpgvet/cpg615-115.html](http://www.fda.gov/ora/compliance_ref/cpg/cpgvet/cpg615-115.html)
6. <http://www.iso.ch/iso/en/>