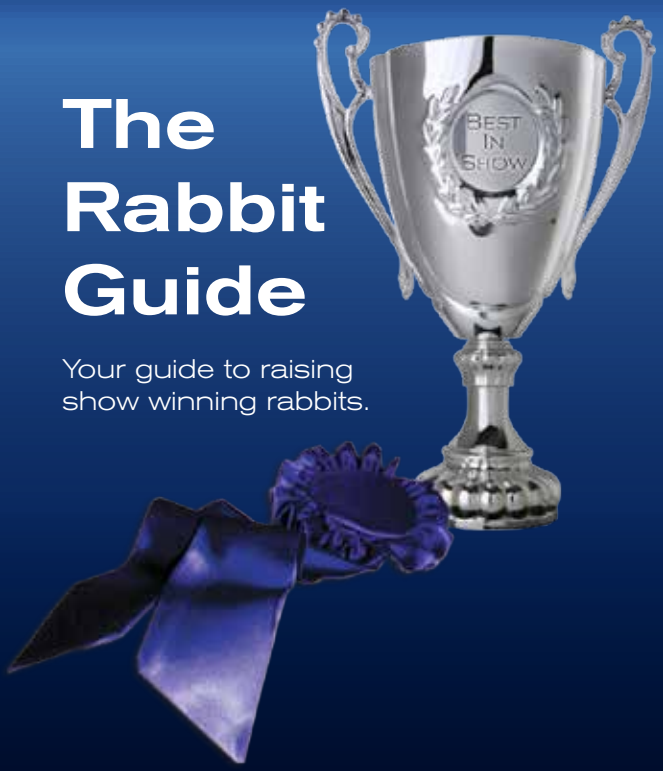
The Pen Pals® Rabbit Program

A successful rabbit production program with good nutrition produces rabbits in good health and with high reproductive ability. Pen Pals offers a choice of nutritious rabbit foods designed to meet the nutritional needs of rabbits at various levels—whether for show, production, or just pure enjoyment. This booklet will introduce you to basic rabbit care knowledge.

Pen Pals®

The Rabbit Guide

Your guide to raising show winning rabbits.



ADM

ADM Animal Nutrition™,
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S9688K-0117

ADM

Welcome to the ADM family of rabbit diets.

The rapidly growing hobby of raising rabbits offers something for everyone. The interest level ranges from the back yard breeder who enjoys rabbits as pets (with an occasional meal of wholesome, low-fat white meat), to the large commercial breeder and to the exhibition breeder who competes with the vigor and skill of any other champion animal breeder.

The charms of raising rabbits are manifold. The hobby can be started with a modest investment, the space requirements are minimal, and the rewards are quicker than with most animals due to the short breeding cycle.

Like many things, it is easy to underestimate the demands of rabbit raising. All domestic animals are completely dependent on their owners. All food, water, and physical care must be provided. The rabbits have no alternative to the food and care provided them. You are truly the master of their fate.

Certain basic knowledge is required to raise rabbits. This booklet will introduce you to many of these basics. This booklet is limited. Other material, more focused on production, is available for the breeder who wants to grow.

RABBIT NUTRITION

The rabbit's ability to achieve high productivity is strongly influenced by nutrition. A successful rabbit production program with good nutrition produces rabbits in good health and with high reproductive ability.

High-producing breeder-does and growing bunnies need more protein, minerals, vitamins, and energy than rabbits which are merely being maintained. To ensure that these breeding and growing rabbits receive all the nutrients they need, it's important to feed a highly palatable properly balanced, digestible ration.

The rabbit's digestive process is highly effective in utilizing available food sources. The upper part of the rabbit's digestive tract is similar to other single-stomach (monogastric) animals. The rabbit's digestive tract, however, includes a large cecum: a portion of the large intestine which can hold up to one-third of the digestive tract's volume. Within the cecum are bacteria that help the rabbit utilize undigested food ingredients.

Rabbits produce two types of feces. One is a hard, dry pellet commonly seen under the cage, and the other is a soft, high-moisture form which is not ordinarily seen because the rabbit "reingests" it during the night. This practice of consuming the "soft" or "night" feces is referred to as "coprophagy," and is a vital source of nutrients to the rabbit.

Protein

Protein is made up of amino acids which form building blocks for muscle, blood, and fur. Protein is very important in all stages of growth. Factors such as litter size, weight gain, and hair coat appearance are directly affected by the quality of protein consumed. For this reason, a higher protein ration, such as Pen Pals® Professional 18% or Professional 16% Rabbit Food, is recommended when more litters per year are desired or when rabbits are being conditioned for show.

The rabbit's opportunity to utilize its protein sources is increased because of coprophagy. The bacteria in the rabbit's cecum produce proteins which are of high nutritional value to the rabbit. In fact, about 25% of the adult rabbit's daily protein intake (DPI) comes as a result of this process. Although the rabbit makes very efficient use of protein sources it receives, the protein must be of high-quality to start with. This means that it must provide the essential amino acids needed by the rabbit. Having these essential amino acids in the diet assures that young, growing rabbits and high-producing does will receive proper nutrient fortification for rapid growth, development, and lactation.

Feed and Water

In addition to rabbit food, you will need to provide ample fresh, clean water. Traditionally, ceramic crocks have been used to feed and water rabbits. The drawbacks to these crocks are that they break easily and water and food are contaminated easily by young bunnies. Always provide plenty of fresh, clean water.

A rabbit will eat approximately 3 to 4% of its body weight daily, or about 0.64 ounces for each pound the rabbit weighs. A well-formulated and well-manufactured pellet is the foundation for any good rabbit nutrition program. The pelleting process enables the manufacturer to combine many ingredients into one package which provides the most complete nutrition possible. Including vitamins and minerals completes the nutritional package.

Other Food Sources

Many breeders like to supplement pellets with grains, greens, and dried breads. Caution is advised unless the breeder has specific goals in mind and has received competent advice.

Changing Feeding Programs

Rabbits should always be changed slowly from one feeding program to another (over a five to seven day period), mixing new food gradually with old food. This allows the rabbit to adjust to new food.

NEVER add oats, straw, barley, greens (such as lettuce), or other foodstuffs to your rabbit feeding program unless properly advised by a competent nutritionist. This will dilute the intake of nutrients in Pen Pals Rabbit products and could depress rabbit performance and may induce scours or diarrhea.

2014 ARBA Convention winners!

Chyann Stewart
Best of Breed Polish Youth

Hannah Stephenson
(not pictured) Best of Breed Checkered Giant Youth

Nicole Bohn
Best of Breed American White Youth

Ravennah Gray
Best of Breed Harlequin Youth

Madelynn Yalowitz
(not pictured) Best of Breed Havana Youth

Jackson Dailey
Best of Breed Florida White, Best Jr, Best Fur Youth

Riley Reichard
Best of Breed Californian Youth

Caroline Waskow
Best of Breed Giant Angora Open

Charlotte Ford
Best of Breed Silver (front) and Best Opposite Sex of Breed Silver (back) Open

Kathi Cordner
Best of Breed American Fuzzy Lop Open

PEN PALS PRODUCTS

The Pen Pals® Rabbit Program

The Rabbit Program offers a choice of four rabbit foods: Professional 18%, Professional 16%, Professional Show Rabbit and Rabbit 15%. All four foods are nutritionally complete. ShowBoost®, a supplement, is also available. The diet you select depends on the availability of the products in your area and your rabbit feeding goals. Because each of our rabbit foods are formulated to meet the nutritional needs of rabbits at various levels of production, an understanding of the rabbit's nutritional requirements can be helpful.

Pen Pals® Professional Show Rabbit

81657AAA
A Specially Fortified Complete Feed
For Growing and Breeding Show Rabbits

A 16% protein, alfalfa-based rabbit feed specially fortified and intended for show rabbits. It is beneficial for rabbits under stress, such as show rabbits. The fiber level is especially advantageous for smaller-sized show rabbits.

Features & Benefits

- Contains sarsaponin (Yucca) to aid in reducing ammonia levels
- Contains CitriStim® and PremiDex™
- Includes ShowBoost® which provides stabilized rice bran, Omega Flax™, Prosponse® yeast, complexed trace minerals, and natural-source vitamin E
- Contains direct fed microbial to aid in digestibility and nutrient availability
- Amino acid balanced for better growth and fur quality. Alfalfa-based formula for consistent palatability and high-quality fiber
- To promote a healthier hindgut, ground corn is not used in the formula
- Inclusion of salt eliminates the need for salt spools which may corrode cages

Feeding Recommendations

Type of Rabbit	Daily Feed Requirements
Bucks	*2–5 oz*
Resting Does	*3–6 oz*
Gestating Does	*4–7 oz*
*Nursing Does (first 3 weeks)**	*0.5–0.75 lb*
*Nursing Does (3 wks to weaning)**	*0.75–1.5 lb*
*Growing Rabbits***	*2–4 oz*

** Self-feed during this period.*
*** For young rabbits, we suggest self-feeding for most economical gains.*

Provide clean, fresh water at all times.

NOTE: These feeding directions are for small-medium sized breeds. Adjust for larger breeds. Provide plenty of clean, fresh water at all times. Surroundings should be kept clean and free of dirt and parasites.

GUARANTEED ANALYSIS

Crude Protein, Min.			16.0%
Crude Fat, Min.			3.5%
Crude Fiber, Min.	17.5%	Max.	22.5%
Calcium (Ca), Min.	0.8%	Max.	1.2%
Phosphorus (P), Min.			0.4%
Salt (NaCl), Min.	0.1%	Max.	0.6%
Vitamin A, Min.			4,000 IU/lb

INGREDIENTS

Dehydrated Alfalfa Meal, Wheat Middlings, Soybean Hulls, Dehulled Soybean Meal, Cane Molasses, Lignin Sulfonate, Stabilized Rice Bran, Brewers Dried Yeast (Saccharomyces Cerevisiae), Vegetable Oil, Salt, Ground Flaxseed, Calcium Carbonate, Zinc Oxide, Vitamin E Supplement, Zinc Amino Acid Complex, Copper Sulfate, Manganous Oxide, Ferrous Sulfate, Manganese Amino Acid Complex, Copper Amino Acid Complex, Sodium Selenite, Iron Amino Acid Complex, Vitamin A Supplement, Mineral Oil, Niacin Supplement, Vitamin B12 Supplement, Menadione Sodium Bisulfite Complex, Vitamin D3 Supplement, Biotin, Calcium Pantothenate, Riboflavin Supplement, Magnesium Amino Acid Chelate, Calcium Iodate, Thiamine Mononitrate, Pyridoxine Hydrochloride, Cobalt Carbonate, Folic Acid, Choline Chloride, Maltodextrin (Wheat Dextrin), Dried Whey, DL-Methionine, Extracted Citric Acid Presscake, Lactobacillus Acidophilus Fermentation Product Dehydrated, Lactobacillus Casei Fermentation Product Dehydrated, Bifido Bacterium Thermophilum Fermentation Product Dehydrated, Enterococcus Faecium Fermentation Product Dehydrated, Propionic Acid (A Preservative), Yucca Schidigera Extract, Zinc Methionine Complex, Manganese Methionine Complex, Copper Lysine Complex, Cobalt Glucoheptonate.

WARNING: This product is not intended for laboratory or research animals. No expressed or implied guarantee as to suitability for that purpose is made.

REMINDER: Feed is perishable. Store this product in a cool, dry area away from insects.

Customer Testimonial

"I started using the Pen Pals Professional Show Rabbit. . . the rabbits adjusted immediately. There was no diarrhea and they consumed it with great aggression. As time went on their appetite seemed to excel. Results from this feed will greatly increase your chances of winning on the show table and will improve your breeding program. With weather conditions (such as extreme heat) I have observed an increase in flesh condition, great fur and a vibrant alert disposition. This feed formula uses no com, but a high fiber content, and in my opinion, that is what works best for small breeds. The only way you will know if it improves your rabbits, is to try it. You will be impressed. You will be a winner!"

—Ron Huster, St. Charles, MO

Pen Pals® Rabbit Pellets

80036AAA
A Complete Feed For Growing and Breeding Rabbits

Whether they are for business or personal enjoyment, the nutritional needs of your rabbits are important to you. All Pen Pals Rabbit Feed Products are nutritionally complete.

Features and Benefits

- A 15% protein, alfalfa-based pellet suitable for all rabbits
- Contains sarsaponin (Yucca) to aid in ammonia reduction
- Contains direct fed microbial to aid in digestibility and nutrient availability
- Palatable alfalfa formula helps keep rabbits eating and provides high-quality fiber required by rabbits
- To promote a healthier hindgut, ground corn is not used in the formula
- Pelleted form helps reduce waste and assures consistent nutrition
- Inclusion of salt eliminates the need for salt spools which may corrode cages
- Complexed trace minerals (zinc, manganese, copper, and cobalt), which are more readily available compared to inorganic sources.

Hand-feeding is recommended for breeding animals, with amounts limited to keep the animals from becoming fat.

If hand-feeding, the number of feedings per day is a matter of preference. It is important, though, to feed the animals the same number of times each day, and as close to the same hours as possible.

It is not necessary to feed hay with Pen Pals Rabbit Pellets. Provide clean, fresh water at all times.

Feed Recommendations

Type of Rabbit	*Daily Feed Requirements*
Bucks	3 to 5 oz
Resting Does	4 to 6 oz
Does During Gestation	5 to 7 oz
Nursing Does:*	
First 3 weeks	0.5 to 0.75 lb
3 weeks to weaning	1.0 to 1.5 lb
Growing Rabbits**	2 to 4 oz

**Self-feed during this period.*

***For young rabbits we suggest self feeding for most economical gains.*

GUARANTEED ANALYSIS

Crude Protein, Min.			15.0%
Crude Fat, Min.			2.5%
Crude Fiber, Min.	17.5%	Max.	21.0%
Calcium (Ca), Min.	0.9%	Max.	1.4%
Phosphorus (P), Min.			0.4%
Salt (NaCl), Min.	0.7%	Max.	1.2%
Vitamin A, Min.			2,000 IU/lb

INGREDIENTS

Dehydrated Alfalfa Meal, Dehulled Soybean Meal, Wheat Middlings, Soybean Hulls, Cane Molasses, Vegetable Oil, Lactobacillus acidophilus Fermentation Product Dehydrated, Lactobacillus casei Fermentation Product Dehydrated, Bifidobacterium thermophilum Fermentation Product Dehydrated, Enterococcus faecium Fermentation Product Dehydrated, DL-Methionine, Yucca Schidigera Extract, Calcium Carbonate, Salt, Zinc Oxide, Vitamin E Supplement, Zinc Amino Acid Complex, Copper Sulfate, Manganous Oxide, Ferrous Sulfate, Manganese Amino Acid Complex, Copper Amino Acid Complex, Cobalt Glucoheptonate, Sodium Selenite, Iron Amino Acid Complex, Vitamin A Supplement, Niacin Supplement, Vitamin B12 Supplement, Menadione Sodium Bisulfite Complex, Vitamin D3 Supplement, Biotin, Calcium Pantothenate, Riboflavin Supplement, Magnesium Amino Acid Chelate, Calcium Iodate, Thiamine Mononitrate, Pyridoxine Hydrochloride, Cobalt Carbonate, Folic Acid, Choline Chloride.

WARNING: This product is not intended for laboratory or research animals. No expressed or implied guarantee as to suitability for that purpose is made.

REMINDER: Feed is perishable. Store this product in a cool, dry area away from insects.

Pen Pals® Professional Rabbit 16

80034AAA
A Specially Fortified Complete Feed For Growing and Breeding Rabbits

A 16% protein, alfalfa-based rabbit feed specially fortified and intended for use by the commercial breeder, show competitor, or those who just enjoy rabbits.

Features & Benefits

- Contains sarsaponin (Yucca) to aid in reducing ammonia levels
- Contains direct fed microbial to aid in digestibility and nutrient availability
- Amino acid balanced for better growth and fur quality. Alfalfa-based formula for consistent palatability and high-quality fiber
- To promote a healthier hindgut, ground corn is not used in the formula
- CitriStim®, an ADM proprietary feed ingredient which is a source of yeast mannans and beta glucans that may favorably impact the gut microial population.
- Inclusion of salt eliminates the need for salt spools which may corrode cages
- Complexed trace minerals (zinc, manganese, copper, and cobalt), which are more readily available compared to inorganic sources.

Feeding Recommendations

Type of Rabbit	Daily Feed Requirements
Bucks	*3–5 oz*
Resting Does	*4–6 oz*
Gestating Does	*5–7 oz*
*Nursing Does (first 3 weeks)**	*0.5–0.75 lb*
*Nursing Does (3 wks to weaning)**	*1–1.5 lb*
*Growing Rabbits***	*2–4 oz*

** Self-feed during this period.*
*** For young rabbits, we suggest self-feeding for most economical gains.*

Provide clean, fresh water at all times.

NOTE: These feeding directions are for medium sized breeds. Adjust for smaller or larger breeds. Provide plenty of clean, fresh water at all times. Surroundings should be kept clean and free of dirt and parasites.

GUARANTEED ANALYSIS

Crude Protein, Min.			16.0%
Crude Fat, Min.			3.0%
Crude Fiber, Min.	17.0%	Max.	21.0%
Calcium (Ca), Min.	0.9%	Max.	1.4%
Phosphorus (P), Min.			0.4%
Salt (NaCl), Min.	0.2%	Max.	0.7%
Vitamin A, Min.			2,300 IU/lb

INGREDIENTS

Dehydrated Alfalfa Meal, Wheat Middlings, Soybean Hulls, Cane Molasses, Calcium Carbonate, Dehulled Soybean Meal, Brewers Dried Yeast (Saccharomyces Cerevisiae), Dried Yeast Fermentation Solubles, Lignin Sulfonate, Vegetable Oil, Salt, Zinc Oxide, Vitamin E Supplement, Zinc Amino Acid Complex, Copper Sulfate, Manganous Oxide, Ferrous Sulfate, Manganese Amino Acid Complex, Copper Amino Acid Complex, Cobalt Glucoheptonate, Sodium Selenite, Iron Amino Acid Complex, Vitamin A Supplement, Mineral Oil, Niacin Supplement, Vitamin B12 Supplement, Menadione Sodium Bisulfite Complex, Vitamin D3 Supplement, Biotin, Calcium Pantothenate, Riboflavin Supplement, Magnesium Amino Acid Chelate, Calcium Iodate, Thiamine Mononitrate, Pyridoxine Hydrochloride, Cobalt Carbonate, Folic Acid, Extracted Citric Acid Presscake, Choline Chloride, DL-Methionine, Lactobacillus Acidophilus Fermentation Product Dehydrated, Lactobacillus Casei Fermentation Product Dehydrated, Bifido Bacterium Thermophilum Fermentation Product Dehydrated, Enterococcus Faecium Fermentation Product Dehydrated, Propionic Acid (A Preservative), Yucca Schidigera Extract, L-Lysine.

WARNING: This product is not intended for laboratory or research animals. No expressed or implied guarantee as to suitability for that purpose is made.

REMINDER: Feed is perishable. Store this product in a cool, dry area away from insects.

Pen Pals® Professional Rabbit 18

80033AAA

A Complete Feed Specially Fortified for Rabbits Requiring Higher Nutritional Levels

An 18% protein, alfalfa-based rabbit feed specially fortified for rabbits requiring higher nutritional levels in the feed. Types of high nutritional needs include does producing six or more litters annually, show rabbits, fryers grown for maximum rates of gain and feed efficiency, Angora and other fiber-producing breeds, and rabbits in stressful environments.

Features & Benefits

- Contains sarsaponin (Yucca) to aid in reducing ammonia levels
- Contains direct fed microbial to aid in digestibility and nutrient availability
- Amino acid balanced for better growth and fur quality. Alfalfa-based formula for consistent palatability and high-quality fiber
- To promote a healthier hindgut, ground corn is not used in the formula
- CitriStim®, an ADM proprietary feed ingredient which is a source of yeast mannans and beta glucans that may favorably impact the gut microial population.
- Inclusion of salt eliminates the need for salt spools which may corrode cages
- Complexed trace minerals (zinc, manganese, copper, and cobalt), which are more readily available compared to inorganic sources.

Feeding Recommendations

Type of Rabbit	Daily Feed Requirements
Bucks	*3–5 oz*
Resting Does	*4–6 oz*
Gestating Does	*5–7 oz*
*Nursing Does (first 3 weeks)**	*0.5–0.75 lb*
*Nursing Does (3 wks to weaning)**	*1–1.5 lb*
*Growing Rabbits***	*2–4 oz*

** Self-feed during this period.*
*** For young rabbits, we suggest self-feeding for most economical gains.*

Provide clean, fresh water at all times.

NOTE: Overfeeding is a common problem with rabbits. Does' fertility drops and kindling problems increase if overweight. Proper condition should be the determining factor in choosing whether self-feeding or limit-feeding is most proper and profitable, except to lactating does and growing bunnies that must be self-fed.

GUARANTEED ANALYSIS

Crude Protein, Min.			18.0%
Crude Fat, Min.			3.0%
Crude Fiber, Min.	16.0%	Max.	19.2%
Calcium (Ca), Min.	0.7%	Max.	1.2%
Phosphorus (P), Min.			0.5%
Salt (NaCl), Min.	0.2%	Max.	0.7%
Vitamin A, Min.			2,600 IU/lb

INGREDIENTS

Dehydrated Alfalfa Meal, Wheat Middlings, Dehulled Soybean Meal, Soybean Hulls, Cottonseed Meal, Cane Molasses, Calcium Carbonate, Lignin Sulfonate, Brewers Dried Yeast (Saccharomyces Cerevisiae), Dried Yeast Fermentation Solubles, Vegetable Oil, Salt, Zinc Oxide, Vitamin E Supplement, Zinc Amino Acid Complex, Copper Sulfate, Manganous Oxide, Ferrous Sulfate, Manganese Amino Acid Complex, Copper Amino Acid Complex, Cobalt Glucoheptonate, Sodium Selenite, Iron Amino Acid Complex, Vitamin A Supplement, Mineral Oil, Niacin Supplement, Vitamin B12 Supplement, Menadione Sodium Bisulfite Complex, Vitamin D3 Supplement, Biotin, Calcium Pantothenate, Riboflavin Supplement, Magnesium Amino Acid Chelate, Calcium Iodate, Thiamine Mononitrate, Pyridoxine Hydrochloride, Cobalt Carbonate, Folic Acid, Extracted Citric Acid Presscake, Choline Chloride, Lactobacillus Acidophilus Fermentation Product Dehydrated, Lactobacillus Casei Fermentation Product Dehydrated, Bifido Bacterium Thermophilum Fermentation Product Dehydrated, Enterococcus Faecium Fermentation Product Dehydrated, Propionic Acid (A Preservative), DL-Methionine, Yucca Schidigera Extract, L-Lysine.

WARNING: This product is not intended for laboratory or research animals. No expressed or implied guarantee as to suitability for that purpose is made.

REMINDER: Feed is perishable. Store this product in a cool, dry area away from insects.

Pen Pals® ShowBoost®

205AAA3C
A Protein-Vitamin-Mineral Supplement for Rabbits Being Fitted for Show

ShowBoost is specially formulated to meet the unique, supplemental nutrient needs of show rabbits. It is also beneficial for rabbits under stress or for those needing additional protein due to weight loss or illness. ShowBoost provides a concentrated source of energy from stabilized rice bran.

Features & Benefits

- Contains stabilized rice bran for concentrated energy; enhances body condition and fur condition
- Provides essential Omega 3 fatty acids from Omega Flax™
- Provides high-quality, all-natural protein, along with minerals, and vitamins A, D, E (including natural-source E), and B-complex
- Provides Prosponse® yeast for enhanced feed palatability, digestibility, and hindgut fermentation
- Complexed trace minerals (zinc, manganese, copper, and cobalt), which are more readily available compared to inorganic sources.
- Mini-pellet form is easy to top-dress or mix with other feeds
- Unique flavor and aroma encourages and helps maintain feed consumption

Feeding Recommendations

ShowBoost is not a complete feed and must be fed in addition to a complete feed. ShowBoost is formulated to provide supplemental nutrients for rabbits being fitted for show. ShowBoost can be top-dressed and will help maintain feed intake. As for all new feeds, ShowBoost should be introduced gradually into the diet.

Feed ShowBoost for at least 40 days before the start of the show season and feed continuously until the end of the show season. Feed at the rate of 0.5 to 1.0 lb per 10 lb of rabbit feed. During lactation and stress periods such as heat, when feed intake is low, mix ShowBoost at 1 lb per 20 lb of rabbit feed.

GUARANTEED ANALYSIS

Crude Protein, min.	25.0%
Crude Fat, min.	7.0%
Crude Fiber, min./max.	11.0-16.0%
Acid Detergent Fiber (ADF), max.	18.0%
Calcium (Ca), min./max.	1.1-1.6%
Phosphorus (P), min.	0.7%
Salt (NaCl), min./max.	1.0-1.5%
Potassium (K), min.	1.0%
Copper (Cu), min.	150 ppm
Selenium (Se), min./max.	2-3 ppm
Zinc (Zn), min.	1,000 ppm
Vitamin A, min.	30,000 IU/lb
Vitamin D_3, min.	2,500 IU/lb
Vitamin E, min.	100 IU/lb

INGREDIENTS

Dehulled Soybean Meal, Stabilized Rice Bran, Soybean Hulls, Flaxseed, Brewers Dried Yeast, Calcium Carbonate, Dried Whey Product, Salt, Monocalcium Phosphate, Dicalcium Phosphate, Extracted Citric Acid Presscake, Zinc Amino Acid Complex, Copper Amino Acid Complex, Manganese Amino Acid Complex, Cobalt Glucoheptonate, Manganous Oxide, Vitamin E Supplement, Zinc Oxide, Magnesium Oxide, Natural and Artificial Flavors, d-alpha Tocopheryl Acetate (Source of Vitamin E), Vitamin A Acetate, Ferrous Sulfate, Mineral Oil, Potassium Sulfate, Cholecalciferol (Source of Vitamin D3), Potassium Iodide, Niacin Supplement, Calcium Pantothenate, Sodium Selenite, Cobalt Carbonate, Menadione Dimethylpyrimidinol Bisulfite (Source of Vitamin K Activity), Riboflavin Supplement, Vitamin B12 Supplement, Biotin.

For more information, contact
AN_RabbitHelp@adm.com

RABBIT PRODUCTION

The rabbit is primarily a herbivore, which means that its major source of foodstuffs is of plant origin. It is also a "simple-stomach" animal, but like the horse, microbial digestion occurs in the large intestine and cecum. As mentioned before, rabbits habitually practice coprophagy; sometimes referred to as "pseudoruminant." The practice begins in rabbits shortly after they begin eating solid food at three to four weeks. Fermentation in the large intestine and the practice of coprophagy probably provide

- the necessary amount of most B vitamins,
- some bacterial-synthesized protein, and
- further digestion of some nutrients by multiple passage through the digestive tract.

The unique digestive process of the rabbit makes it extremely efficient at utilizing roughages and very sensitive to "carbohydrate over-load" of the large intestine. In diets containing high levels of grain and low levels of high-quality fiber, carbohydrates pass through the small intestine and enter the large intestine. In this area, carbohydrates act as food for growth of undesirable bacteria. This frequently results in enteritis (upset stomach, diarrhea, etc.) produced by bacterial toxins. For these reasons, Professional Rabbit Foods contain a minimum of 40% alfalfa. Pen Pals is designed to be fed as the total ration and, as such, is formulated to meet all known dietary needs of the rabbit.

Feeding

A rabbit owner who is "show" oriented may wish to use Professional Rabbit for lactating does and getting bunnies started. Mature show animals on the show circuit should be fed the lower protein, lower energy Rabbit Pellets. Feed on a consistent, regular basis.

Approximate Feeding Rates for Medium-sized breeds

Type of Rabbit	Daily Feed Requirement
Bucks	3 to 5 oz
Resting Does	4 to 6 oz
Gestating Does	5 to 7 oz
Lactating Does*	
First 3 weeks	0.5 to 0.75 lb
3 weeks to weaning	1 to 1.5 lb
Growing Rabbits*	2 to 4 oz

Adjust feeding rate for small and large breeds.
** Self-feed on a free-choice basis for best results.*

BREED SELECTION

One of the beauties of rabbits is the variety of breeds available. Currently more than 40 breeds are recognized in the U.S. There are also numerous varieties within these breeds which provide further options. Breeds range in size from slightly over two pounds to nearly 20 pounds.

The most common sizes are the intermediate breeds which include most of the "commercial" breeds. Sizes average about 10 pounds. Another common size is the "compact" breed which averages five to six pounds. (See Breed Chart included in this brochure.)

Compact breeds are enjoying a surge resulting from the increase in urban-suburban breeders who are faced with space problems. Their smaller size requires cages about one third smaller than those for intermediate rabbits. The compact doe will normally have litters averaging five or six, compared to eight for an intermediate breed.

Locating Rabbits

For the novice breeder, locating quality rabbits can be difficult. The dealer from whom you buy your feed can usually put you in contact with a good breeder. A check with the local county extension office can be helpful. A local rabbit club will gladly assist. Such rabbit clubs can be located through the American Rabbit Breeders Association, Bloomington, Illinois. If you have your heart set on a breed you cannot find locally, once again, the American Rabbit Breeders Association can be helpful by steering you to the national specialty club for that breed.

Breed Criterion

Good rabbits may be purchased for a reasonable price. The rarer the breed, the more expensive the rabbit. Purchase rabbits from reputable breeders. Look at the size and neatness of the various operations. Ask questions about litter size, litters per year. Other questions will suggest themselves. The willingness of the breeder to share information is important. Beware of breeders who are reluctant to answer questions. They may have secrets they don't want to share or don't know the answer. There are invariably some things you will have to learn on your own, but the fewer surprises you have, the better.

BREED CHART

Name	*Principal Color(s)*	*Avg. lb*	*Traits*
American	Blue & White	10	Commercial
Angora, Giant	White	10-11	Wool
Angora, English	White & Colored	6	Wool
Angora, French	White & Colored	8+	Wool
Angora, Satin	High sheen wool	8.5	Wool
Belgian Hare	Red with black ticking	8	Show
Beveren	White, Blue, Black	10	Commercial
Britannia Petite	Black, Black Otter, Chestnut, White, Sable Marten	2.25	Show
Californian	Pointed White	9	Commercial
Champagne d'Argent	Bluish-white tipped w/black	10	Commercial
Checkered Giant	Black & Blue	11+	Show
Chinchilla, American	Like Chinchilla	10	Commercial
Chinchilla, Giant	Like Chinchilla	14	Commercial
Chinchilla, Standard	Like Chinchilla	6.5	Commercial/ Fur
Cinnamon	Cinnamon with smoke-gray ticking	9.5	Commercial
Creme d'Argent	Creamy white with orange cast	9	Commercial
DutchBlack, Blue,	4.5 Chocolate, Gray, Steel, Tortoise	Show	
English Spot	Black, Blue, Chocolate, Gold Gray, Lilac, Tortoise	6	Show
Flemish Giant	Black, Blue, Fawn, Light Gray, Sandy, Steel Gray, White	14+	Show
Florida White	White	5	Lab/Show
Harlequin	Alternating (Magpie & Japanese)	8	Show
Havana	Black, Blue, Chocolate	5.5	Fur/Show
Himalayan	Black, Blue, Chocolate, Lilac	3.5	Show
Hotot, Dwarf	White with black eye-band	2.5	Show
Hotot, Blanc de	White w/ black eye-band	9	Commercial/ Show
Jersey Wooly	Multiple colors	3	Show
Lilac	Lilac	6-7	Show
Lop, English	Solid, Broken	10	Show
Lop, French	Solid, Broken	11	Commercial/ Show
Lop, Mini	Solid, Broken	6	Show
Lop, American Fuzzy	Broken, Solid	3.5	Show
Lop, Holland	Solid, Broken	3	Show
Netherland Dwarf	Self, Shaded, Rov, Agouti, Tan Pattern	2.5	Show
New Zealand	Black, Red, White	10	Commercial
Palomino	Golden, Lynx	10	Commercial
Polish	Black, Chocolate, Blue Eyed White, Ruby Eyed White, Broken, Blue	2.5	Show
Rex	Has velvet-smooth coat in many colors	8	Commercial/ Fur
Rex, Mini	Has velvet-smooth coat in many colors	4	Fur/Show
Rhinelander	Orange/Black on White	8	Show/ Commercial
American Sable	Sepia brown	8-9	Show/ Commercial
Satin	Nine colors with high sheen	9.5	Commercial/ Fur
Satin, Mini	White with ruby eyes	4.75	Commercial
Silver	Black, Brown, Fawn	7	Show
Silver Fox	Black	10	Commercial
Silver Marten	Black, Chocolate, Blue, Sable	8	Show/ Commercial
Tan	Black, Blue, Chocolate, Lilac	4-5	Show
Thrianta	Fiery, brilliant red with dark brown eyes	6	Show

REPRODUCTION and BREEDING

The wild rabbit is a seasonal breeder with the peak of reproductive activity occurring in the spring and early summer. With domestic rabbits, genetic selection and environmental control have resulted in frequent sexual activity with periods of reduced fertility. These periods will be discussed in "Seasonal Problems," page 22.

The rabbit does not show regular estrus cycles: that is, recurring periods of sexual desire. Ovulation in the female rabbit is induced by mating and occurs approximately 10 hours after the female is bred. When sexual activity begins, the follicles on the ovary remain active for 12 to 16 days if the doe is not fertilized. After this time, they begin to regress and are replaced by new follicles that begin developing toward the end of the 12 to 16 day period. There may be a transitional period, during which the new set of follicles is growing and the old set is regressing, in which the doe lacks interest in the male and is temporarily infertile.

The gestation period, or the period from breeding to kindling, is normally 31 to 32 days. Kindling (birth) may occur as early as 28 days or as late as 35 days; however, approximately 98% of the normal litters will be kindled between the 30th and 33rd day.

Sexual Maturity

The age of sexual maturity depends on breed and individual development. In the medium size breeds, the age for first mating is generally five months for does and seven months for bucks. Although age is the main criteria for breeding readiness, does must be of proper size and weight to be able to produce good size litters without impaired birth weights. Replacement does should be bred when they reach sexual maturity; reduced fertility frequently occurs when breeding is delayed.

Breeding

Breeding does and replacement does should be housed in individual pens to reduce injuries from fighting and pseudopregnancies. These false pregnancies may result from infertile mating or from sexual excitement when does "ride" each other in group housing. The duration of pseudopregnancy is approximately 17 days. Therefore, does intended for breeding should be housed separately for at least 18 days prior to intended breeding to ensure they will have passed through this period.

Due to the fact that sexually active does normally have follicles present on the ovary, the time of breeding is dictated, to a large degree, by the number of litters desired per year. The following schedules are used for five to eight litters a year.

	Kindle	Rebreed	Wean	Kindle
Five litters/year—73 day cycle				
No. days to	0	42	56	73
Six litters/year—61 day cycle				
No. days to	0	28	42	61
Seven litters/year—52 day cycle				
No. days to	0	21	35	52
Eight litters/year—45 day cycle				
No. days to	0	14	28	45

Regardless of the schedule used, bunnies are to be weaned two weeks after rebreeding.

Breeding Suggestions

1. When the doe's vulva is deep red in color she is ready for breeding.
2. Take the doe to the buck's cage for one service. When she slightly lifts her haunches and the buck mates with her, he will fall off to the side or backward. Let him try again. Technique is not a strong point of male rabbits. Return her to her cage.
3. If the buck fails to quickly attempt to service the doe, change bucks.
4. Should the doe fight the buck, restrain her. Does can be territorial and turn on a buck. If she insists on not cooperating, try the next day.
5. The doe ovulates about 10 hours after service.
6. Palpate does 10 to 14 days after breeding. Palpation (checking for pregnancy) should be done by an experienced rabbit handler. If not pregnant, rebreed.

7. The nest box should be placed with the doe 28 days after breeding. Have it filled with clean straw or wood shavings. Some breeders use both. Usually on the 31st night, the doe will pull fur and have her litter. If she should get confused on the first litter and scatter the litter on the cage floor, replace the bunnies in the box. Approximately 30% of first litters die.

Some breeders wean at 28 days, others wait longer. Whichever, the bunnies must be separated at 12 weeks before they start to fight.

Seasonal Problems

Many producers experience breeding problems during extremely hot weather when temperatures exceed 85°F. Research indicates that bucks start to lose fertility when temperatures exceed 85°F and the loss is extensive when temperatures exceed 90°F. It appears that older bucks are more affected than junior bucks. Bucks are affected before does are affected, so keep bucks in the coolest part of the rabbitry. Keep a good supply of young bucks for use during hot weather. Breed during the cooler portion of the day. Morning is best, but late evening is acceptable.

A fall slump is also often noticed. This phenomenon is often the result of summer's high temperatures, but can also be related to the natural reluctance of rabbits to produce young in the fall and early winter. Good records allow producers to identify these suspect breeders and "cull" them to reduce the problem. Do not obtain replacements from does with histories of fall breeding slumps.

Herd Reproduction Suggestions

1. Depending upon the breeding cycle used, keep one buck for every 10 to 20 does.
2. Bucks can be used daily in cool weather, use every other day in hot weather.
3. Replace bucks having records of low productivity.
4. Replace approximately 1/3 of the bucks yearly.
5. Retain "junior" does to replace up to 1/3 of the breeding herd yearly.
6. Replacement does should be housed separately at least 18 days before breeding.
7. Purchase good replacement stock periodically to prevent inbreeding.
8. Keep bucks cool in the rabbitry to avoid heat induced sterility when temperatures exceed 85°F.

Selecting Breeding Stocks

(Medium breeds — New Zealand Whites, etc.)

1. Good production—8+ uniform bunnies per litter
2. High meat yield—57% or higher dressing percentage
3. Good milking ability—10 or more teats with litter weights of 6 lb + @ 3 weeks
4. Good weight gains—1.25 lb or more at 4 weeks; 4 lb fryers in 8 weeks
5. Good food conversion
6. Consistent breeding and good mothering instinct—high offspring survival rate
7. Good health and offspring free of genetic defects
8. Desirable coat quality

Kindling

Does will normally deliver at 31 days after breeding, and management practices at this time may make the difference between saving and losing litters.

Adjust the feeding program of dry does to prevent over-conditioning (getting fat). Fat does probably will have problems at birth, with milking, rebreeding, and conception. The nest box should be placed in the cage at the 28th day of gestation so the doe can build her nest. Before adding the nest box, wash and disinfect the box and cage floor. The nest box should be approximately 2/3 full of bedding such as shavings, straw, etc. During cold weather, the addition of insulation board at the bottom will preserve heat. During hot weather (90°F and above), use a bedding that prevents bunnies from burrowing and remove some of the loose bedding and fur for better air circulation.

Quiet is the word when nervous does are kindling. Avoid handling does, if possible, and keep dogs and other animals from causing distractions. Strangers (to the rabbits) should not be allowed in the area, and routine chores should be performed in an organized, quiet manner. In all cases, avoid loud and unusual noises. Examine the nest the day after kindling, record the birth date and remove mortalities. Nest boxes can be removed when all bunnies have left it—usually by the 21st day.

HOUSING and EQUIPMENT

It is not within the scope of this material to provide engineering information on building construction. A logical approach is to visit existing facilities in climates similar to your own and gather information on what works best. Naturally, the type of housing depends on climate. Before construction, check zoning laws, electricity, and water sources and truck accesses. Site selection is important. Select a site with good drainage, sufficient space for isolation and freedom from excessive winds. Remember, the structure must protect the rabbits against predators and excessive temperature changes.

Cages

Modern caging is one of the major breakthroughs in rabbit raising.

Traditional cage sizes for intermediate breeds are 30 inches by 30 inches for does and 24 inches by 30 inches for bucks. Compact breeds will require cages 1/3 smaller and dwarf breeds about half the size. Giant breeds require cages to be 24 inches high rather than the standard 18 inches. These cages are based on leaving litters with does until eight weeks of age and having food and water containers inside the cage unlike current practice. Many breeders wean as young as 28 days and use outside feeders and water bottles, thereby reducing the cage space requirement.

The all-wire cages should be suspended from the ceiling with wires or chains, making entry difficult for pests. For outside cages, wooden frames may be made of 2 by 4's into which the cages may be placed.

Cages for pet rabbits can be simple affairs, but they must be sturdy. Rabbits have marvelous teeth. They can rapidly destroy wood. Also, wood absorbs smells which can quickly become offensive.

A good cage is made of 1 inch by 2 inch galvanized wire (usually #16) and 1/2 inch by 1 inch (14 gauge) floors. Fiberglass or metal pans are held in place with a wire sub-floor. Wood shavings, kitty litter, or ground corn cobs work nicely for litter absorption in the bottom pan. A metal shield about 2 inches high around the outside of the cage helps deflect rabbit "spray." If such shields aren't available, a visit to a sheet metal shop might help.

Hardware cloth generally isn't sturdy enough for long-term use. The wire is too light for the stress of a rambunctious rabbit.

Cage arrangements are extremely varied, from single to multi-decked. Again, it is advisable to visit several operations with different arrangements before deciding what will work best for you. Every system has advantages and disadvantages; these should be carefully considered before making a final choice.

Cages may be purchased commercially or constructed by an individual. Suggested cage dimensions, for intermediate breeds, are:

- Doe Cages:
  30 inches by 30 inches by 18 inches.
- Buck Cages:
  24 inches by 30 inches by 18 inches.
- Growing Cages:
  30 inches by 30 inches by 18 inches. Capacity 10 to 15 fryers to market. In extremely hot weather place only 10 to 12 fryers per cage.
- Isolation Cages:
  24 inches by 30 inches by 18 inches. Use for isolating sick or newly purchased animals. Keep separate from main housing.
- Nest Boxes:
  12 inches by 18 inches by 8 inches. Can be made of plywood, masonite, or wire with a liner.

Cage Material

Tops and sides—1 inch by 2 inch welded wire. You may want to use 1/2 inch by 1 inch "baby-saver" wire on the sides 4 inches high.

Bottoms—5/8 inches by 1 inch or 1/2 inch by 1 inch welded wire.

Doors—16 inches by 13 inches latched over 14 inches by 12 inches opening.

Nest boxes come in metal versions with removable bottoms. These can be purchased from the same places as cages. Many breeders make their own nest boxes from scrap wood. The front part should be 8 to 12 inches wide, depending on the size of the doe. Holes should be drilled in the bottom for drainage.

Self-feeders

There are many types of self-feeders available. The most important factor is that they should be low enough to allow small bunnies to feed. The feeder lip should be no higher than three to four inches above the floor.

Outside metal feeders are becoming more common. They fill from the outside of the cage, saving time and inside space. Two types are available. The more common "J" style that slips through a hole cut in the side wire of the cage, and the two-part style that doesn't require a hole cut in the wire. Rabbits are less able to scratch food out of such feeders. Water bottles are a good investment as they save time, effort, and cage space. Less water is wasted as there is no splashing.

Experience indicates that automatic watering systems with nipple or "dew-drop" outlets are worthwhile and should be provided in each cage. Located 6 inches above the floor, bunnies can use them early. Incorporating a pressure reducing valve will prevent waste and wet floors. It is advantageous to use an automatic water proportioner which allows you to add medications and waterline cleaners to the system.

Buildings

Converted poultry buildings, garages, or utility sheds work well for rabbits. If the breeder wants, droppings can be allowed to fall to the floor for removal several times a year. If desired, cages with metal pans can be used and cleaned weekly.

Plywood roofs can be covered with rolled roofing. Tarps or heavy plastic may be hung for winter protection. Be sure to have the roof extended far enough over the edge to provide shade from the sun. Rabbits must be able to get out of the sun!

Good ventilation is critical for the health and productivity of the rabbits. The ventilating system should provide 8 to 10 air changes per hour, without subjecting the rabbits to undesirable drafts. This can be accomplished with windows, adjustable panels and curtains, fans, and open-sided buildings. In some areas of the country, heaters will be necessary during extremely cold weather.

As is the case with many animals, day length influences reproductive activity in the rabbit. Lighting should be maintained at a constant level for 10 to 14 hours a day, and be strong enough to maintain reproductive activity.

Scale

It is essential that weights be taken periodically in order to accurately evaluate performances.

ILLNESS and health

Rabbits are generally healthy. Like most animals, however, they may become ill. Your first choice in seeking advice for proper health care should be a veterinarian. Ask other rabbit producers for a veterinarian recommendation.

Record Keeping

Doe

- ID number, origin, birth date, and breed
- Each mating: date, buck ID, body weight, observations
- Diagnose pregnancy
- Kindling: date, litter size (alive & stillborn)
- Weaning: date, litter size and weight
- Selling: date, litter size, live weight
- Notes on maternal behavior, health and treatments, other

Buck

- ID number, origin, birth date, and breed
- Each mating: date, doe ID, observations
- Kindling: litter size (alive & stillborn)
- Weaning: date, litter size and weight
- Selling: litter size, live weight
- Notes on behavior and health

Litter

- Weaning: date, number, and live weight
- Feed consumption
- Selling weight

Physiological Data	
Criteria	**Measurement**
Life Span	Average of 6 years
Breeding Age	4 months for small breeds 5-6 months for medium breeds 9-12 months for large breeds
Estrus Cycle	15-16 days; ovulation occurs post-coitus
Gestation Time	31 days; between 29-35 days
Weaning Age	4-8 weeks
Heart Rate	205 beats per minute; range between 200-250
Rectal Temperature	Range 102.2° –103.2°F; min. 101.9°F, max. 103.7°F
Respiratory Rate	53 breaths per minute; variation of 38-60 per minute
Food Consumption	0.4-1.2 oz/lb of weight
Water Consumption	Growth – 3 oz; Adult – 12 oz; Lactation – 1-2 quarts

Sanitation

Diarrhea and *Pasteurella* are the major causes of rabbit losses. Environment and management are the most important factors in preventing morbidity and mortality in a rabbit facility. Feeders, waterers, floors, and equipment need to be disinfected with chlorine bleach or an iodophor compound monthly. Bedding placed under the cages will absorb urine and reduce odors. Removing feces and urine weekly will help eliminate bacterial build-up. Sick rabbits should be removed immediately from the other rabbits and the cage cleaned and disinfected.

Coccidiosis

This is a diminishing problem due to the self-cleaning cage. This protozoan can infect the liver and digestive tract of the rabbit. Generally, it will be fatal only with very young or stressed adults. An adult-rabbit carrier will be rough looking and won't gain weight properly. A simple test on a fecal sample (by your veterinarian) can determine whether this is a problem. If present, a treatment will be suggested.

Parasite

Pinworms are believed to be the only common parasite found in rabbits. Once again, the animal will be rough and won't gain weight properly. Self-cleaning cages have brought this under general control. Please check with your veterinarian regarding the best way to eliminate this parasite.

Snuffles

Snuffles, or more properly *Pasturella*, has long been the bane of rabbit growers. This nasal infection can develop into pneumonia, defies antibiotics, and many attempts to develop a vaccine have failed. Breeders using feed with a natural additive known as "Yucca" report the additive significantly reduces the incidence of this viral disorder which is worsened by the presence of ammonia. Yucca significantly reduces the amount of ammonia in rabbit facilities, as is evidenced by the sharp reduction of the odor usually associated with rabbits. ADM Alliance Nutrition incorporates this natural additive in all of its rabbit products for the health of the rabbits and peace of mind of rabbit growers. Yucca has been used in conventional farm animal feed since 1976. The product is not absorbed in the digestive system and is considered a foodstuff, not a medication, meaning no withdrawal time is required.

Ear Canker

This is caused by ear mites. The rabbit will scratch and shake its head. Scabs will form in the ear and crust over. Many ear remedies, or a light oil, will suffocate the mites. The cage should be cleaned to kill any wandering mites. Rabbits in adjoining cages should be treated also. Specific treatment should be recommended by a veterinarian familiar with this problem.

Fleas

Fleas and ticks can be killed with appropriate, approved powder.

Wry Neck

The exact cause of this is unknown, although the bacteria usually isolated is a *Pasturella sp.*, and there is inflammation of the middle ear. The result is that the rabbit will start to tilt its head at an odd

angle. This will worsen until the animal cannot stand. It is probably best to humanely dispose of the animal. Check with a veterinarian for recommendations.

Sore Eyes

This disorder is marked by the inability to open the eye. A discharge will come from the eye. A veterinarian's recommendation is advised.

Sore Hocks

These are basically what the name implies. It is said that a good hemorrhoid medicine is adequate treatment. Check with a veterinarian for a recommendation. A rough floor may cause sore hocks.

Malocclusion (buck teeth)

This problem is not curable and can be passed genetically. It is generally recommended that those afflicted should not be permitted to enter the breeding colony.

HOUSE TRAINING

Rabbits can be trained in a way peculiar to the animal. They are creatures of habit. Once a location has been used as a "potty spot," the rabbit tends to use it again. Take fresh droppings and urine soaked litter and place it in a litter box. Show this to the rabbit. The rabbits will find the litter box on their own thereafter.

Letting a Rabbit Run

Rabbits enjoy running. It is natural for them to frisk about. It is best to do this only when supervised. A rabbit cannot resist chewing an electrical cord or a speaker cable. No amount of discipline will change this. Rabbits also enjoy chewing wood. A block of wood is a pleasant diversion and represents no harm to the rabbit. Avoid soft plastic items; the rabbit can ingest them.

Punishment

Rabbits aren't puppies! Conventional scolding or swatting doesn't work. When a rabbit does something unfortunate, just put it back into its cage and ignore it. Pretty soon it will associate going back to its cage for certain acts. Remember this: there are no trained rabbit acts.

Cardinal Rule—Don't house two adult males.

Don't try to house two adult male rabbits. This shy creature will not tolerate male company. A buck rabbit doesn't have buddies! However, two does will get along well.

ADDITIONAL INFORMATION

For additional information, contact your local Pen Pals feed dealer, who might be aware of various rabbit organizations in your community. Should you require more specific information on our feeds than what is presented in this booklet, please contact us at

ADM Animal Nutrition
Attn: Rabbits/Specialty Animal Feeds
1000 N. 30th Street, PO Box C1
Quincy, IL 62305-3115
Phone: 866-666-7626
Email: AN_RabbitHelp@adm.com
Web site: ADMAnimalNutrition.com

For additional rabbit raising information, contact your local extension service or the ARBA.

The American Rabbit Breeders Association, Inc.
P.O. Box 5667
Bloomington, IL 61702
Phone: 309-664-7500
Website: www.arba.net
E-mail: info@arba.net

The ARBA has excellent publications which can greatly enhance the pleasure of raising rabbits.

The Best Choice for Show, Meat, & Pleasure Rabbits

Pen Pals Professional 18 **80033AAA**
An 18% protein, alfalfa-based rabbit feed specially fortified for rabbits requiring higher nutritional levels in the feed. Types of high nutritional needs include does producing six or more litters annually, show rabbits, fryers grown for maximum rates of gain and feed efficiency, Angora and other fiber-producing breeds, and rabbits in stressful environments.

Pen Pals Professional 16 **80034AAA**
A 16% protein, alfalfa-based rabbit feed specially fortified and intended for use by the commercial breeder, show competitor, or those who just enjoy rabbits.

Professional Show Rabbit **81657AAA**
A 16% protein, alfalfa-based, complete rabbit feed specially fortified for show rabbits. It includes the addition of ShowBoost, a protein-vitamin-mineral supplement formulated to meet the unique, supplemental nutrient needs of show rabbits. Professional Show Rabbit is beneficial for rabbits under stress, such as show rabbits. The fiber level is especially advantageous for smaller-sized show rabbits.

Complete Feeds for Growing and Breeding Rabbits

- ***Nutritionally Complete & Balanced*** — no additional sources of protein, energy, vitamins or minerals are needed
- ***High-Quality Alfalfa-based Formulas*** — rabbits prosper on high-quality, fermentable fiber
- ***Amino Acid Balanced*** — yields better growth rate and fur quality
- ***Provides Salt*** — no need for salt spools
- ***Provides CitriStim*** — An ADM proprietary feed ingredient which is a soure of yeast mannans and beta glucans that may favorably impact the gut microbial population
- ***Contains Direct Fed Microbial*** — aids in digestibility and nutrient availability
- ***Contains Yucca*** — helps reduce ammonia levels
- ***Vitamin–Mineral Fortified*** — our proprietary premix is specific for rabbits
- ***Complexed trace minerals***—may be especially advantageous for stressed rabbits.
- ***Mini-pellet Form*** — reduces waste and ensures consistent nutrition with every nibble
- ***Added Vegetable Oil*** — provides extra energy
- ***No Corn*** — reduces concerns of aflatoxin and excess starch to hindgut
- ***Consistent Nutrient Profile***
- ***No Animal Product***
- ***Customer Support*** — ADMAnimalNutrition.com and AN_RabbitHelp@adm.com or 866-666-7626
- ***Technical Support*** — Consulting Ph.D. nutritionist provides industry expertise and experience

← Rabbit Pedigree certificates are available from your local Pen Pals dealer.