

# Autoclavable Mouse Breeder Diet

# 5021\*

## DESCRIPTION

Autoclavable Mouse Breeder Diet is the companion version of Mouse Diet 9F 5020. This diet is formulated using the unique and innovative concept of Constant Nutrition®, paired with the selection of highest quality ingredients to assure minimal inherent biological variation in long-term studies. It is fortified with extra nutrients to compensate for nutrient losses during autoclaving and ensure nutritional adequacy. It is recommended for the life-cycle feeding of high reproducing mice. Where post-partum breeding is employed, the mice require a high energy content to fulfill their metabolic needs to sustain gestation and lactation simultaneously. This product is coated with a small amount of silicon dioxide to reduce clumping during the autoclaving process.

### Features and Benefits

- Constant Nutrition® formula helps minimize nutritional variables
- A high-energy formulation that supports post-partum reproduction
- Fortified with extra nutrients to compensate for losses during autoclaving
- Processed with silicon dioxide to reduce sticking and clumping
- High quality animal protein added to create a superior balance of amino acids for optimum performance

### Product Forms Available

- Oval pellet, 10 mm x 16 mm x 25 mm length (3/8"x5/8"x1")
- Meal (ground pellets), special order

### Other Versions Available

- 5020 Mouse Diet 9F

## GUARANTEED ANALYSIS

Crude protein not less than	20.0%
Crude fat not less than	9.0%
Crude fiber not more than	5.0%
Ash not more than	6.5%

## AUTOCLAVING SUGGESTIONS

To autoclave the pellets, place on trays, in small bags, or in larger bags to a depth of no more than 3 inches. When steam autoclaved, the pellets swell and exert force on adjacent pellets. Confinement by a bag or container creates additional pressure, resulting in sticking as the fibrous materials polymerize. **Assay before and after autoclaving:** Conditions of sterilization must be determined for each autoclaving unit. Microbiological evaluation should be done to insure sterilization is achieved. It is best to assay the diet before and after sterilization to determine nutrient losses.

## INGREDIENTS

Ground corn, wheat middlings, dehulled soybean meal, wheat germ, fish meal, ground wheat, porcine animal fat preserved with BHA, brewers dried yeast, soybean oil, calcium carbonate, salt, dried beet pulp, ground oats, choline chloride, pyridoxine hydrochloride, menadione dimethylpyrimidinol bisulfite (vitamin K), thiamin mononitrate, DL-methionine, vitamin A acetate, silicon dioxide, cholecalciferol, folic acid, dl-alpha tocopheryl acetate, biotin, calcium pantothenate, riboflavin, nicotinic acid, vitamin B<sub>12</sub> supplement, manganese oxide, zinc oxide, ferrous carbonate, copper sulfate, zinc sulfate, calcium iodate, cobalt carbonate, sodium selenite.

## FEEDING DIRECTIONS

Autoclavable Mouse Diet should be fed to breeders and lactating mice on a free-choice basis. Plenty of fresh, clean water should be available to the animals at all times.

**Mice**-Adult mice will eat up to 5 grams of pelleted ration daily. Some of the larger strains may eat as much as 8 grams per day per animal, especially during heavy lactation. Feed should be available on a free choice basis in wire feeders above the floor of the cage.

**NOTE: Do not feed this or any other autoclavable diet prior to autoclaving.**

## CHEMICAL COMPOSITION<sup>1</sup>

Nutrients <sup>2</sup>		Sulfur, % . . . . .0.30	
<b>Protein, %</b> . . . . .	<b>21.5</b>	Sodium, % . . . . .	0.26
Arginine, % . . . . .	1.23	Chlorine, % . . . . .	0.42
Cystine, % . . . . .	0.29	Fluorine, ppm . . . . .	15
Glycine, % . . . . .	0.98	Iron, ppm . . . . .	220
Histidine, % . . . . .	0.52	Zinc, ppm . . . . .	140
Isoleucine, % . . . . .	0.92	Manganese, ppm . . . . .	130
Leucine, % . . . . .	1.55	Copper, ppm . . . . .	17
Lysine, % . . . . .	1.19	Cobalt, ppm . . . . .	0.52
Methionine, % . . . . .	0.69	Iodine, ppm . . . . .	1.6
Phenylalanine, % . . . . .	0.87	Chromium, ppm . . . . .	0.53
Tyrosine, % . . . . .	0.58	Selenium, ppm . . . . .	0.35
Threonine, % . . . . .	0.77		
Tryptophan, % . . . . .	0.25	<b>Vitamins</b>	
Valine, % . . . . .	1.00	Carotene, ppm . . . . .	0.3
Serine, % . . . . .	0.92	Vitamin K (as menadione), ppm . . . . .	3.2
Aspartic Acid, % . . . . .	1.89	Thiamin Hydrochloride, ppm . . . . .	86
Glutamic Acid, % . . . . .	4.06	Riboflavin, ppm . . . . .	8.0
Alanine, % . . . . .	1.16	Niacin, ppm . . . . .	89
Proline, % . . . . .	1.45	Pantothenic Acid, ppm . . . . .	22
Taurine, % . . . . .	0.03	Choline Chloride, ppm . . . . .	2200
<b>Fat (ether extract), %</b> . . . . .	<b>9.0</b>	Folic Acid, ppm . . . . .	3.0
<b>Fat (acid hydrolysis), %</b> . . . . .	<b>9.0</b>	Pyridoxine, ppm . . . . .	15
Cholesterol, ppm . . . . .	276	Biotin, ppm . . . . .	0.30
Linoleic Acid, % . . . . .	2.52	B <sup>12</sup> , mcg/kg . . . . .	51
Linolenic Acid, % . . . . .	0.25	Vitamin A, IU/gm . . . . .	30
Arachidonic Acid, % . . . . .	0.02	Vitamin D <sup>3</sup> (added), IU/gm . . . . .	3.3
Omega-3 Fatty Acids, % . . . . .	0.39	Vitamin E, IU/kg . . . . .	59
Total Saturated Fatty Acids, % . . . . .	2.21	Ascorbic Acid, mg/gm . . . . .	—
Total Monounsaturated			
Fatty Acids, % . . . . .	2.40		
<b>Fiber (Crude), %</b> . . . . .	<b>3.5</b>	<b>Calories provided by:</b>	
Neutral Detergent Fiber <sup>3</sup> , % . . . . .	15.2	Protein, % . . . . .	23.471
Acid Detergent Fiber <sup>4</sup> , % . . . . .	4.5	Fat (ether extract), % . . . . .	21.480
<b>Nitrogen-Free Extract</b>		Carbohydrates, % . . . . .	55.049
<b>(by difference), %</b> . . . . .	<b>50.4</b>		
Starch, % . . . . .	34.3		
Glucose, % . . . . .	0.22		
Fructose, % . . . . .	0.22		
Sucrose, % . . . . .	0.71		
Lactose, % . . . . .	0.00		
<b>Total Digestible Nutrients, %</b> . . . . .	<b>81.4</b>		
<b>Gross Energy, kcal/gm</b> . . . . .	<b>4.49</b>		
<b>Physiological Fuel Value<sup>5</sup>,</b>			
<b>kcal/gm</b> . . . . .	<b>3.66</b>		
<b>Metabolizable Energy,</b>			
<b>kcal/gm</b> . . . . .	<b>3.36</b>		
<b>Minerals</b>			
<b>Ash, %</b> . . . . .	<b>5.5</b>		
Calcium, % . . . . .	0.81		
Phosphorus, % . . . . .	0.78		
Phosphorus (non-phytate), % . . . . .	0.43		
Potassium, % . . . . .	0.78		
Magnesium, % . . . . .	0.21		

- \*Product Code
1. Formulation based on calculated values from the latest ingredient analysis information. Since nutrient composition of natural ingredients varies and some nutrient loss will occur due to manufacturing processes, analysis will differ accordingly.
  2. Nutrients expressed as percent of ration except where otherwise indicated. Moisture content is assumed to be 10.0% for the purpose of calculations.
  3. NDF = approximately cellulose, hemi-cellulose and lignin.
  4. ADF = approximately cellulose and lignin.
  5. Physiological Fuel Value (kcal/gm) = Sum of decimal fractions of protein, fat and carbohydrate (use Nitrogen Free Extract) x 4,9,4 kcal/gm respectively.