

PMI® Micro-Stabilized Rodent Liquid Diet

LD 101*

Technical Data

DESCRIPTION

Diet LD 101 is a dry powder used to prepare a liquid diet formulated for rodents. It is nutritionally balanced with excellent palatability. This diet is designed for use as the control diet when LD 101A is being used as the test diet. LD 101 can be used in other applications where solid diets are not appropriate.

Features and Benefits

- Nutritionally-balanced
- Volatile ingredients can be included
- Easily prepared
- Provides stable nutrients
- Shipped in dry form to simplify storage, shipping and stability
- Minimal foaming
- Fully suspended
- Stabilized against microbial growth

Product Forms Available

- Dry Powder
- Dry Powder, Irradiated

Catalog

7551 (5LD1)
54451 (5LD1)

GUARANTEED ANALYSIS

Crude protein not less than16.0%
Crude fat not less than15.0%
Crude fiber not more than10.0%
Ash not more than5.0%

* **Diet Preparation Instructions:** To 770 gms. of water, add 230 gms.

Micro-Stabilized Rodent Liquid Diet mix (LD 101). Blend vigorously for 15-30 seconds with a mechanical blender until completely suspended. For best results add water to blender before dry mix.

Additional Considerations:

- For best results a mechanical blender should be used for diet preparation; hand blending does not suspend the diet adequately to avoid some settling out of undissolved ingredients.
- Do not over-blend; excessive mechanical blending creates foaming.

INGREDIENTS

Vitamin-free casein, olive oil, maltodextrin, dried corn syrup, soy fiber, corn oil, suspension colloid, safflower oil, L-cystine, DL-methionine, vitamin A acetate, cholecalciferol, dl-alpha tocopheryl acetate, menadione dimethylpyrimidinol bisulfite (source of vitamin K), fumaric acid, citric acid, propionic acid, ascorbic acid, potassium sorbate, cyanocobalamin, thiamin mononitrate, riboflavin, calcium pantothenate, nicotinic acid, choline chloride, pyridoxine hydrochloride, folic acid, inositol, p-aminobenzoic acid, biotin, calcium acetate, calcium phosphate, potassium phosphate, sodium phosphate, magnesium sulfate, sodium chloride, manganese sulfate, ferrous fumarate, zinc chloride, cupric sulfate, chromium chloride, sodium fluoride, ammonium molybdate, calcium iodate, sodium selenite.

FEEDING DIRECTIONS

Diet consumption will vary according to animal size and sex. An average rat should consume about 74-109 grams of liquid diet (17-25 grams dry diet) daily. The growth rate of rats maintained on this diet should be similar to that attained by young rats (55-100 grams) maintained on a good quality, nonpurified rodent diet. Mice should consume at least 20 grams of liquid diet per day. Allow new animals an adequate period of time to adjust to their surroundings. After they have adjusted, introduce the liquid diet gradually by offering some of the liquid diet while the regular diet is still present. Gradually decrease the amount of regular diet offered while increasing the amount of liquid diet over a 3-5 day period. Additional time for adjustment may be necessary for the ethanol diets. Prepare the diet as frequently as needed and always **refrigerate** to minimize loss of nutrients. Fresh diet should be prepared at least every **4 days**. Although the diet may be bacteriologically sound for a longer period of time, diet more than **4 days** old may have deteriorated nutritionally. Before using diet which has been prepared on a previous day, check to ensure all of the ingredients are in suspension. Remix if necessary. Additional water may be provided in separate drinking tubes, but may not be consumed.

CHEMICAL COMPOSITION¹

Nutrients ²	Reconstituted ² Powder		Vitamins	Reconstituted ² Powder	
	Dry	Powder		Dry	Powder
Protein, %	4.07	17.7	Vitamin K		
Arginine, % . . . . .	.016	0.70	(as menadione), ppm . . . . .	.025	1.1
Cystine, % . . . . .	.007	0.30	Thiamin, ppm	1.5	6.5
Glycine, % . . . . .	.009	0.39	Riboflavin, ppm	1.7	7.2
Histidine, % . . . . .	.012	0.53	Niacin, ppm	7.6	33
Isoleucine, % . . . . .	.022	0.94	Pantothenic Acid, ppm	3.9	17
Leucine, % . . . . .	.039	1.70	Choline Chloride, ppm	265	1150
Lysine, % . . . . .	.033	1.42	Folic Acid, ppm	0.53	2.3
Methionine, % . . . . .	.014	0.63	Pyridoxine, ppm	1.4	6.3
Phenylalanine, % . . . . .	.022	0.94	Biotin, ppm	0.05	0.22
Tyrosine, % . . . . .	.023	0.99	Inositol, ppm . . . . .	.25	110
Threonine, % . . . . .	.018	0.77	p-aminobenzoic		
Tryptophan, % . . . . .	.005	0.21	acid, ppm	12.5	54
Valine, % . . . . .	.026	1.12	B ₁₂ , mcg/kg . . . . .	.25	110
Fat (ether extract), %	3.9	16.9	Vitamin A, IU/gm	3.0	13
Fiber (Crude), %	0.69	3.0	Vitamin D ₃ (added),		
			IU/gm	0.40	1.7
			Vitamin E, IU/kg . . . . .	.30	130
			Ascorbic Acid, mg/gm	9.0	39
			Energy*		
			Protein, kcal/kg	173	
			Fat, Kcal/kg	350	
			Carbohydrates, kcal/kg	477	
			*Energy Levels used (kcal/gm)		
			Protein = 4.25; Fat = 9.00;		
			Maltodextrin = 4.00; Ethanol =		
			7.07. The protein value is different		
			than the 4 kcal/gm for protein, as		
			generally used.		
			* 1 kilogram of diet in liquid form,		
			when prepared according to direc-		
			tions, provides 1000 kilocalories (1		
			kcal per gram).		
			* Lieber, CS & LM DeCarli (1982)		
			Alcoholism: Clinical and		
			Experimental Research 6: 523-531.		
			Miller, SS, ME Goldman, CK		
			Erickson & RL Shorey (1980)		
			Psychopharmacology 68: 55-59.		

*Product Code

1. Based on the latest ingredient analysis information.
2. Values are based upon the liquid form of the diet when prepared according to directions (230 gm dry powder with 770 gm water).