



Berkshire  
Dairy and Food Products, Inc.

## Demineralized Whey (Nutritek 500)

### PRODUCT DESCRIPTION

A sweet dairy whey with 50% of the minerals removed by a special electro dialysis process which preferentially removes the monovalent sodium and chloride ions. This process provides essentially salt-free taste due to reduction of sodium, potassium and chloride ions. Calcium and phosphorus levels are only slightly reduced, still providing significant nutritional value. Processing conditions are designed to minimize damage to the highly nutritious whey proteins.

### FUNCTIONALITY

Nutritek® 500 adds a milky flavor that is essentially salt free and provides added solids for achieving the desired body and texture, economically, in a food application. Lack of salty flavor characteristics permit increased usage compared to dry whey. Since 75% of Nutritek 500 is milk sugar (lactose), it can be used as a partial replacement for sucrose to reduce the excess sweetness of some coatings and fillings.

### TYPICAL APPLICATIONS

**Compound coatings:** Nutritek 500 is preferred over other dairy ingredients because of its lack of salty flavor. Direct replacement of 50% NFDM with Nutritek 500 can be made without other changes in formulation, processing and product characteristics.

**Soups and dry mixes:** Acts as an emulsifier and provides dairy flavor as well as providing an economical bulking and flowing agent.

**Drinks and salad dressings:** Stable at acid pH, Nutritek 500 provides dairy flavor, good solubility and emulsification.

**Ice Cream and Frozen desserts:** Use up to 25% of the serum solids in hard pack ice cream and up to 50% of the serum solids in other frozen desserts.

**Fillings:** Replace up to 100% of the NFDM in filling formulas.

### STORAGE CONDITIONS

Dry/ambient conditions are recommended. Store less than 75% relative humidity. Do not store under refrigeration.

### RE-EVALUATION DATE

Twenty-four months from date of manufacture.

### TECHNICAL DATA

**Ingredient Listing:** Reduced Minerals Whey (milk)

Physical Analysis	Typical	Specification
Protein (Nx6.38)%	12.8	12.0 (min)
Lactose %	78.2	
Fat %	1.2	1.5 (max)
Minerals %	3.0	4.0 (max)
Moisture %	4.8	5.0 (max)
pH	6.0-6.5	

### Microbiological Standards

Std Plate Count cfu/g	1,000	30,000 (max)
Coliform Count cfu/g	Negative	10 (max)
E. coli	Negative	Negative
Salmonella	Negative	Negative

### Food Energy

K Cal/100g	370
------------	-----

### Mineral Analysis

Calcium mg/100g	410
Magnesium mg/100g	100
Phosphorus mg/100g	450
Potassium mg/100g	700
Sodium mg/100g	320
Chloride mg/100g	90

### Vitamin Analysis

Vitamin A IU/100g	20
Vitamin C mg/100g	1.0
Thiamine mg/100g	0.5
Riboflavin mg/100g	2.1
Niacin mg/100g	1.3

### Physical Characteristics

Appearance	Free from lumps that do not break up under slight pressure
Flavor	Free from any foreign flavors and odors
Extraneous Matter	Free from extraneous matter

### Allergen Classification

Dairy product – contains whey proteins and lactose.