

# FIBER-ENHANCED DIET

(Sheet 1 of 2)

## PURPOSE:

This diet is designed to provide foods containing indigestible fiber as a part of preventive and/or therapeutic nutrition.

## DESCRIPTION:

The high fiber diet is based on the basic food groups with a greater emphasis on fiber-rich foods such as fruits, legumes, vegetables, whole-grain breads, and high fiber cereals. The Daily Reference Value for fiber is 25 grams (based on 2000 calorie per day diet). The American Diabetes Association has reported that up to 40 gm fiber daily or 25 gm per 1000 Kcal may be beneficial (National Cancer Institute recommends 25-30 gm).

## BASIC INFORMATION:

Dietary fiber is the component found in many foods that cannot be digested by the intestinal tract. Adequate fluid intake is important when following a high fiber diet due to the water binding capacity of fiber. Fiber should be increased in the diet slowly to avoid unpleasant side effects (gas, abdominal bloating, cramps). Dietary fiber can be divided into two separate categories: Water insoluble fiber and water soluble fiber.

### Water Insoluble Fiber:

Water insoluble components, such as cellulose, hemicellulose and lignin, remain essentially unchanged during digestion. Foods containing water-insoluble fiber include: fruits, vegetables, cereals, and whole grain products. Research suggests that insoluble fiber may be beneficial in the prevention and/or treatment of constipation and diverticular disease and may decrease the risk of colon cancer.

### Water Soluble Fiber:

Water soluble fiber, such as gum, pectin and mucilages, does dissolve in water and is found in oats, beans, barley and some fruits and vegetables. Some studies showed that this type of fiber may improve blood glucose and cholesterol levels.

## NUTRITIONAL ADEQUACY:

The high fiber diet is adequate in all nutrients. Some studies indicate that excessive consumption of some high fiber foods may bind and decrease the absorption of the following minerals: calcium, copper, iron, magnesium, selenium and zinc. However, it is theorized that with a varied, well balanced diet, mineral or nutrient imbalances are unlikely to happen in those consuming a high fiber diet.

**DIETARY FIBER CONTENT OF FOODS IN COMMONLY SERVED PORTIONS**

FOOD GROUP	Less than 1 gm	1-1.9 gm	2-2.9 gm	3-3.9 gm	4-4.9 gm	5-5.9 gm	Over 6 gm
Breads (1 slice)	Bagel, white, French	Whole-wheat	Bran muffin	None	None	None	None
Cereals (1 oz)	Rice-Krispies, Special K, Cornflakes	Oatmeal, Nutri-Grain, Cheerios	Wheaties, Shredded-Wheat	Most, Honey-Bran	Bran Chex, 40% Bran-Flakes, Raisin-Bran	Corn Bran	All-Bran, Bran Buds, 100% Bran-Fiber
Pasta (1 cup)	None	Macaroni, Spaghetti	None	Whole-Wheat Spaghetti	None	None	None
Rice (1/2 cup)	White	Brown	None	None	None	None	None
Legumes (1/2 cup) cooked	None	None	None	Lentils	Lima beans, Dried peas	None	Kidney beans, Baked beans, Navy beans

# FIBER-ENHANCED DIET

(Sheet 2 of 2)

## DIETARY FIBER CONTENT OF FOODS

FOOD GROUP	Less than 1 gm	1-1.9 gm	2-2.9 gm	3-3.9 gm	4-4.9 gm	5-5.9 gm	> 6 gm
Vegetables (1/2 cup)	Cucumber, Lettuce (1 cup), Green pepper	Asparagus, Green beans, Cabbage, Cauliflower, Potato (no skin), Celery	Broccoli, Brussels sprouts, Carrots, Corn, Potato (with skin), Spinach	Peas	None	None	None
Fruits (1 medium)	Grapes (20), Watermelon (1 cup)	Apricots (3), Pineapple (1/2 cup), Peach with skin, half grapefruit	Apple without skin, Banana, Orange	Apple with skin, Pear with skin, Raspberries (1/2 cup)	None	None	None

## SAMPLE MENU

Suggested Meal Plan	Suggested Foods and Beverages
<b>BREAKFAST</b> Fruit Juice Cereal Meat/Meat Substitute Bread - Margarine Milk/Beverage	Prune Juice All Bran Egg Whole Grain Toast & Margarine* 1% Milk* & Coffee or Tea
<b>DINNER - NOON OR EVENING MEAL</b> Meat/Meat Substitute Potato/Potato Substitute Vegetable and/or Salad Bread - Margarine Dessert Beverage	Meat Loaf Baked Potato Lima Beans, Tossed Salad with Dressing Rye Bread & Margarine* Fig Cookie Coffee or Tea
<b>SUPPER - EVENING OR NOON MEAL</b> Soup or Juice Meat/Meat Substitute Vegetable and/or Salad Bread - Margarine Dessert Milk/Beverage	Lentil Soup Baked Chicken Banana Squash, Tossed Salad & Dressing Rye Bread w/Margarine* Baked Apple with Cinnamon 1% Milk* & Coffee or Tea

\*To reduce amount of fat in your diet, omit margarine and use skim milk.

### Nutrient Analysis

Calories	1930 Kcal	Riboflavin	2.5 mg
Protein	95 gm	Thiamin	1.7 mg
Carbohydrate	239 gm	Folate	527 mcg
Fat	74 gm	Calcium	992 mg
Cholesterol	474 mg	Phosphorus	1789 mg
Dietary Fiber	32 gm	Zinc	15 mg
Vitamin A	2822 IU	Iron	22 mg
Vitamin C	106 mg	Sodium	3180 mg
Niacin	31 mg	Potassium	4158 mg

Adapted from the Arizona Diet Manual (revised 1992)