



Label Literacy: Daily Values and Percent Daily Values

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What Are Daily Values?

The Daily Values (DVs) that appear on Nutrition Facts labels are reference numbers. They are standard values representing daily needs of specific nutrients. These values are set by the federal government based on current nutrition recommendations. Some labels list the DVs for 2,000- and 2,500-calorie diets at the bottom of the Nutrition Facts label.

Because DVs are based on a 2,000- or 2,500-calorie diet, your actual needs may be different. The DV for total fat, saturated fat, total carbohydrate, and dietary fiber change with the number of calories eaten. However, the DVs for cholesterol (300 mg) and sodium (2,400 mg) are the same at all calorie levels. If you eat less than 2,000 calories per day, your personal DV for total fat, saturated fat, and total carbohydrate would be less than those listed on the label. However, everyone 20 years of age or older should eat at least 20 g of dietary fiber per day. That level can go up if you eat more calories, but it should not decrease.

Daily Values Found on the Nutrition Facts Label

		Calories	2,000	2,500
Total Fat	Less than		65g	80g
Saturated Fat	Less than		20g	25g
Cholesterol	Less than		300mg	300mg
Sodium	Less than		2,400mg	2,400mg
Total Carbohydrate		300mg	375mg	
Dietary Fiber			25g	30g

What Are Percent Daily Values?

Knowing the DVs is helpful for people who want to be aware of what makes up a good diet. However, their real value is found in comparing the nutritional contribution of a serving of a specific food to the total diet. This can be done using the Percent Daily Values (% DV). The % DV gives a general idea

of how the amount of a nutrient in a serving of food fits into a 2,000 calorie reference diet.

You will find the % DVs on the Nutrition Facts label, in the right-hand column, following the information on calories and calories from fat. The % DVs are figured by dividing the actual number of grams or milligrams of the nutrient being considered by the amount recommended in the 2,000-calorie reference diet. For example: If a food contains 9 g of total fat, then 9 is divided by 65 (total fat in grams recommended in a 2,000-calorie diet). The % DV is 14%. That means a serving of that food would provide 14 % of all the fat recommended for a day for someone who eats a 2,000-calorie diet.

Where Do the Daily Values Come From?

Some of the DV figures are set for adults and children ages four years or older by expert panels. These include DVs for total fat, saturated fat, cholesterol, total carbohydrate, dietary fiber, sodium, potassium, and protein. They are based on accepted nutritional recommendations for a 2,000 calorie reference diet.

Nutrition Recommendations

Food Component	Food Component Calculated As*
Total Fat	30 percent of total calories eaten
Saturated Fat	10 percent of total calories eaten
Total Carbohydrate	60 percent of total calories eaten
Dietary Fiber	11.5 grams per 1,000 calories
Protein	10 percent of total calories eaten

*Some numbers may be rounded for nutrition labeling.

The DVs for cholesterol, sodium, and potassium are based on the 1989 National Research Council's Diet and Health Report. The DVs are: cholesterol, 300 mg; sodium, 2,400 mg; and potassium, 3,500 mg. These values stay the same no matter how many calories are eaten.

Daily Values for vitamins and minerals are based on the U.S. Recommended Dietary Allowances (U.S. RDAs). Nineteen vitamins and miner-

als fall into this group. Not all are required on every label. On most processed foods, you will find information on vitamin A, vitamin C, calcium, and iron. Some labels have a shortened format to fit small containers, and some foods fall under special conditions and thus have a shortened label.

The DVs for vitamins and minerals are listed in the following table. The items listed in bold will be on the Nutrition Facts label unless special conditions occur.

Daily Values

Food Component	Daily Value*
Total Fat	65 g**
Saturated Fat	20 g**
Cholesterol	300 mg
Sodium	2,400 mg
Potassium	3,500 mg
Total Carbohydrate	300 g**
Dietary Fiber	25 g***
Protein	50 g**
Vitamin A	5,000 IU
Calcium	1 g
Iron	18 mg
Vitamin D	400 IU
Vitamin E	30 IU
Thiamin	1.5 mg
Riboflavin	1.7 mg
Niacin	20 mg
Vitamin B6	2.0 mg
Folate	0.4 mg
Vitamin B12	6.0 mcg
Biotin	0.3 mg
Pantothenic acid	10 mg
Phosphorus	1 g
Iodine	150 mcg
Magnesium	400 mg
Zinc	15 mg
Copper	2.0 mg

* Daily Value for adults and children ages 4 or older.
 ** Daily Value based on a 2,000-calorie reference diet.
 *** Daily Value based on 11.5 g per 1,000 calories.

Looking at a Label

Look at a Nutrition Facts label to see what a serving of a type of snack food will provide in relation to the 2,000-calorie reference diet.

Nutrition Facts

Serving Size 1 oz (28g)
 Servings Per Container About 16

Amount Per Serving

Calories 150 Calories from Fat 80

	% Daily Value*	
Total Fat 9g	14%	1
Saturated Fat 2g	11%	
Cholesterol 30mg	10%	2
Sodium 300mg	12%	
Total Carbohydrate 16g	5%	
Dietary Fiber less than 1g	1%	3
Sugars less than 1g		
Protein 2g		
Vitamin A 0%	Vitamin C 0%	4
Calcium 0%	Iron 2%	

* Percent Daily Values are based on a 2,000 calorie diet. Your daily values may be higher or lower depending on your calorie needs:

	Calories	2,000	2,500
Total Fat	Less than	65g	80g
Saturated Fat	Less than	20g	25g
Cholesterol	Less than	300mg	300mg
Sodium	Less than	2,400mg	2,400mg
Total Carbohydrate		300g	375g
Dietary Fiber		25g	30g

Calories per gram

Fat 9 Carbohydrate 4 Protein 4

- 1 % Daily Value, Fat:** The % DV shows how the amount of fat in a serving of this snack food compares to 65 grams, the DV for fat for a 2,000-calorie reference diet. In this case a serving is 14% of the recommended intake of total fat for a 2,000 calorie diet.
- 2 % Daily Value, Cholesterol:** The % DV shows how the amount of cholesterol in a serving of this snack food compares to 300 mg, the DV for cholesterol for all calorie levels. A serving of this food contains 10% of the cholesterol recommended for the day.
- 3 % Daily Value, Dietary Fiber:** The % DV shows how the amount of dietary fiber in a serving of this snack food compares to 25 g, the Daily Value for fiber for a 2,000-calorie diet. This food contains a very small amount

of fiber, only 1% of what is recommended for the day.

- ④ **% Daily Value, Vitamin C:** The % DV shows how the amount of vitamin C in a serving of this snack food compares to 60 mg, the DV for vitamin C for all calorie levels. This particular food contains no vitamin C.

What if a Person Doesn't Eat 2,000 Calories a Day?

Many people will not eat 2,000 calories per day. The DV can still be used to compare products. For example, if there are two similar foods and one provides 15% of the DV of calcium and the other provides 25%, it may be wise to choose the product higher in calcium.

The % DV information on the label can be used when you eat more or less than 2,000 calories. If you eat less than 2,000 calories, your total % DV for an individual nutrient in all the foods you eat in one day can add up to less than 100 percent. If you eat more than 2,000 calories, your total % DV can total more than 100 percent for an individual nutrient in all the foods you eat in one day. The following table shows the adjusted % DV for individual nutrients for total fat, saturated fat, carbohydrate, dietary fiber, and protein.

Example: Assume a woman eats 1,600 calories a day. The adjusted % DV for 1,600 calories is 80%. That means the total % DV for each nutrient should add up to 80% for the day. So, if the total % DV for fat in all the foods she eats in one day adds up to 80% or less, her diet will be within the nutritional recommendations for fat. The same will be true for the saturated fat.

It is possible to determine what the recommended amounts for these five nutrients are in grams rather than in percentages. For a short cut

Adjusted Total % Daily Value for Total Fat, Saturated Fat, Carbohydrate, Dietary Fiber, and Protein for Different Calorie Levels

<i>Calories</i>	<i>Adjusted % Daily Value of these nutrients in all foods Intake eaten in one day can add up to:</i>
1,600	80 percent
2,000	100 percent
2,200	110 percent
2,500	125 percent
2,800	140 percent
3,200	160 percent

to personalized reference amounts, use the table at the bottom of this page.

The number of grams for each of the five nutrients is used in a slightly different way than the % DV. Here an individual would total the number of grams of each nutrient in the foods they ate in a day. They would compare that total to the amount, in grams, of each nutrient in their personalized nutrition reference amount.

Example: Assume a man ate 2,800 calories per day. His personalized nutrition reference amounts would be 93 g total fat; 31 g saturated fat; 420 g carbohydrate; 32 g dietary fiber; and 70 g protein. If he was concerned about the total fat and saturated fat in his diet, he would use the information provided on the Nutrition Facts label to total the number of grams of each of these nutrients in all the foods he ate in a day. If that total for fat were 93 g or less and the total for saturated fat were 31 g or less, his diet would fit within the nutritional recommendations for those nutrients.

Personalized Nutrition Reference Amounts for Different Calorie Levels

<i>Food Component</i>	<i>Calories Eaten in an Average Day</i>					
	<i>1,600</i>	<i>2,000*</i>	<i>2,200</i>	<i>2,500</i>	<i>2,800</i>	<i>3,200</i>
Total Fat (g)	53	65	73	80	93	107
Saturated Fat (g)	18	20	24	25	31	36
Total Carbohydrate (g)	240	300	330	375	420	480
Dietary Fiber (g)	20 **	25	25	30	32	37
Protein (g)	46 ***	50	55	65	70	80

* % Daily Value on the label for total fat, saturated fat, carbohydrate, dietary fiber, and protein (if listed) is based on a 2,000-calorie reference diet.

** 20 g is the minimum amount of fiber recommended for all calorie levels below 2,000.

*** 46 g is the minimum amount of protein recommended for all calorie levels below 1,800.

References:

- Anon. (1993) Understanding food labels. American Dietetic Assoc., 216 W. Jackson Blvd., Chicago, IL 60606.
- Anon. (1993) How to read the new food label. American Heart Assoc., National Center, 7272 Greenville Ave., Dallas, TX 75231.
- Browne, M.B. (1993) Label facts for healthful eating. National Food Processor Association, Mayer Corp., 2501 Neff Road, Dayton, OH 45414.

USDA (1993) The new food label. Food News for Consumers, vol. 10, no. 1-2. U.S. Department of Agriculture, Food Safety and Inspection Service, Superintendent of Documents, Washington, DC 20402.

For more information on using food labels, ask for these Oklahoma Cooperative Extension Service publications:

Label Literacy: Basic Training (T-3611)
Label Literacy: The Label Dictionary (T-3614)

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