

Nutrition, Fiber & Better Sleep

Emerging research suggests that getting enough fiber may support better sleep quality through several important pathways in the body.



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How Fiber May Support Healthy Sleep¹

Support for Gut Health

Fiber helps feed beneficial gut bacteria that produce compounds such as butyrate. Emerging research suggests these compounds may influence circadian clock genes involved in regulating the sleep-wake cycle. Pre-clinical studies have shown that pistachios may help increase beneficial butyrate-producing bacteria.

Supports Maintenance of Steady Blood Sugar

Fiber slows digestion and absorption of carbohydrates, helping reduce rapid spikes and drops in blood glucose. Stable blood sugar levels may support better sleep quality and fewer nighttime awakenings.

Nutrients That Work Together

High-fiber foods are often naturally lower in sugar and saturated fat—both of which are associated with poorer sleep quality when consumed in excess. Additionally, fiber rich foods provide beneficial nutrients and compounds linked to sleep health, including:

- **Magnesium**
- **Polyphenols**
- **Phytomelatonin**

Pistachios are a unique example because they provide fiber along with polyphenols and phytomelatonin, while being low in saturated fat and sugar.

How Much Fiber Do Adults Need?

For overall health, **adults should aim for at least 25 grams of fiber per day.**

Researchers are still studying whether higher amounts provide additional sleep-specific benefits.

Simple Ways to Add More Fiber

- Add fruit to breakfast
- Choose nuts, fruits, or vegetables for snacks
- Include leafy greens with lunch and dinner
- Add pistachios to salads, fish, yogurt or homemade granola
- Incorporate whole grains and legumes regularly

Food (grams) ²	Serving	Fiber (grams)
Baby carrots, raw	8-10	2
Banana	1 medium	3
Black beans, cooked	½ cup	8
Broccoli, raw	1 cup	2
Pistachios, kernels	1 oz	3
Raspberries	1 cup	9
Spinach, raw	1 cup	2
Quinoa, cooked	1 cup	4

A homemade granola with whole grains, pistachios, and dried fruit is one delicious way to support both nutrition and sleep-friendly eating habits. Looking for a recipe? Try out this pistachio orange granola!

Pistachio Orange Granola

Yields: 8 Servings

Nutritional Facts (per serving):

500 calories
10.5 g protein
24 g fat
9 g saturated fat
69 g carbohydrates
32 g sugars
10 g fiber
0 mg cholesterol
13 mg sodium

Recipe below. Also scan for more pistachio-packed recipes at americanpistachios.org.



Ingredients:

1 cup unsweetened shredded coconut
2 tablespoons flax seed oil
1/3 cup maple syrup
4 cups old-fashioned (rolled) oats
1 cup pistachios
1/3 cup honey
2 teaspoons ground cinnamon
1/2 teaspoon freshly grated nutmeg
1/3 cup sesame seeds
1 cup chopped dried fruits
including dates, apples, apricots
Grated zest of 2 large oranges

Directions:

Position racks in the center and upper third of the oven and preheat to 375° F.

Spread the coconut on a baking sheet. Bake on a center rack, stirring often, until lightly toasted, about 10 minutes. Transfer to a large bowl.

Bring the flax seed oil, maple syrup and orange zest to a simmer in a medium saucepan. Place oats, pistachios, honey, cinnamon, nutmeg and sesame seeds in a bowl and toss well with saucepan ingredients. Spread mixture on baking sheets.

Bake the mixture in a 375° F oven, stirring often, switching the position of the baking sheets from top to bottom and front to back halfway through baking, until the granola is golden brown, about 15 minutes.

Remove from the oven and let cool. Stir the granola into the bowl of coconut along with dried fruit. The granola can be stored at room temperature in airtight containers for up to 1 month.

Serve with Greek yogurt.

Reference: 1-St-Onge M-P, Roberts A, Shechter A, Choudhury AR. Fiber and saturated fat are associated with sleep arousals and slow wave sleep. *Journal of Clinical Sleep Medicine*. 2016;12(1):19-24. doi:10.5664/jcsm.5384 2-U.S. Department of Agriculture, Agricultural Research Service. (2019). FoodData Central. <https://fdc.nal.usda.gov>.