

PISTACHIOS AND SPORTS NUTRITION

By Lauren Manaker, MS, RDN, LD, CLEC

Pistachios are packed with essential nutrients to help athletes reach peak performance

Complete Plant-based Protein For Muscle Repair Support

Complete proteins are vital for athletes because they contain all nine essential amino acids necessary for muscle repair, growth, and overall recovery.¹

Iron To Help Transport Oxygen To Tissues

Iron plays an essential role in oxygen transportation and energy production. Adequate iron levels ensure that muscles receive the oxygen needed to produce energy efficiently, which is vital for sustained athletic performance.³

Phosphorus For Energy Production and Bone Health

Phosphorus is vital for the formation of adenosine triphosphate (ATP), the primary energy carrier in cells, which is essential for muscle contractions during physical activity. Additionally, phosphorus plays a key role in bone health by working with calcium to strengthen bones, potentially reducing the risk of fractures and injuries.⁵

High Antioxidant Capacity To Help Neutralize Free Radicals

Antioxidants play a crucial role in an athlete's diet due to their ability to neutralize free radicals, harmful molecules that can cause cellular damage. Consuming foods loaded with antioxidants may help mitigate this damage, promoting faster recovery and reducing muscle soreness.²

Magnesium To Support Energy Production and Electrolyte Balance

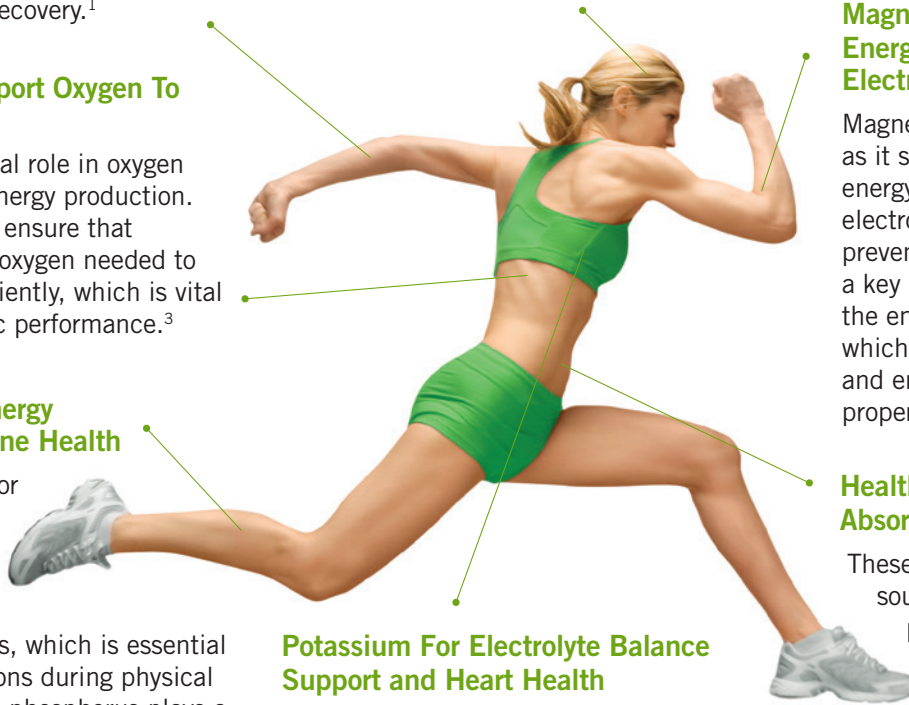
Magnesium is vital for athletes as it supports muscle function, energy production, and electrolyte balance, helping to prevent muscle cramps. It plays a key role in ATP synthesis, the energy source for cells, which enhances performance and endurance while ensuring proper hydration.⁴

Healthy Fats For Nutrient Absorption Support

These fats serve as an energy source, particularly during prolonged, low-intensity exercises. They also aid in the absorption of fat-soluble vitamins such as A, D, E, and K, which are essential for maintaining strong bones, immune function, and muscle repair.⁷

Potassium For Electrolyte Balance Support and Heart Health

Potassium helps to maintain proper muscle function and cardiovascular health. As an essential electrolyte, potassium helps regulate fluid balance, nerve signals, and muscle contractions.⁶



References:

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5. Bird RP, Eskin NAM. The emerging role of phosphorus in human health. *Adv Food Nutr Res*. 2021;96:27-88. doi: 10.1016/bs.afnr.2021.02.001. Epub 2021 Apr 15. PMID: 34112356.
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SPORTS NUTRITION RESEARCH

Title	Study Type	Key Outcome
<p>Philpott J, et al. Pistachios as a recovery food following downhill running exercise in recreational team-sport individuals. <i>Eur J Sport Sci.</i> 2023;23(12):2400-2410.</p>	<p>Randomized Cross-Over Clinical Trial</p>	<p>Eating 85 grams (~ 3 oz.) of pistachios every day for two weeks prior to and during recovery from exercise-induced muscle damage significantly reduced muscle soreness when compared with those who did not eat pistachios.</p>
<p>Philpott J, et al. Pistachios as a recovery food following downhill running exercise in recreational team-sport individuals. <i>Eur J Sport Sci.</i> 2023;23(12):2400-2410.</p>	<p>Randomized Cross-Over Clinical Trial</p>	<p>High dose pistachio nut ingestion may provide some alleviation of muscle soreness following exercise-induced muscle damage. In this study, average muscle soreness during exercise recovery was reduced ($p < 0.05$) among those who consumed 85 grams of pistachios for two weeks vs. those who didn't consume pistachios.</p>
<p>Rayo VU, et al. Influence of pistachios on force production, subjective ratings of pain, and oxidative stress following exercise-induced muscle damage in moderately trained athletes: A randomized, crossover trial. <i>Metabol Open.</i> 2022;16:100215.</p>	<p>Randomized Cross-Over Clinical Trial</p>	<p>Eating 3.0 oz of pistachios every day for two weeks may reduce delayed onset of muscle soreness and maintain muscle strength among moderately trained male athletes.</p>
<p>Celik, H, et al. The Protective Effects of Pistachio Nut (<i>Pistacia vera</i> L.) on Thiol/Disulfide Homeostasis in Young Soccer Players Undergoing a Strenuous Exercise Training Program. <i>Acta Med. Mediterr</i> 2019; 35, 893–898.</p>	<p>Randomized Controlled Trial</p>	<p>Consuming 25 grams (~ 1 oz.) of pistachios every day for 21 days positively impacted the redox status of professional soccer players compared to the control group, potentially due to how pistachio consumption may boost soccer players' antioxidant capacity.</p>