


# EPA and DHA Omega-3s for Active Aging

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 Thursday November 17, 2022 – 12:30pm EST




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## Legacy Ingredients: EPA and DHA



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## Health Benefits of EPA and DHA



<b>EPA</b>	+	<b>DHA</b>
<ul style="list-style-type: none"> <li>'Hard' cardiovascular endpoints</li> <li>Mental/clinical benefits (e.g. schizophrenia)</li> <li>Inflammation (AA)</li> </ul>		<ul style="list-style-type: none"> <li>Pregnancy/lactation</li> <li>Early childhood</li> <li>Brain growth and cognitive function</li> <li>Visual and neural function</li> </ul>




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In foods and most supplements,  
EPA and DHA occur together

+ Fortified Products

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Legacy ingredient,  
emerging science\*

\*There is so much existing, ongoing, and emerging science!

- Two of the most well studied nutrients
- Lucky to have 40,000+ studies, but vast amount of research makes understanding the science a challenge
- Despite extensive research to date, most people aren't getting enough EPA and DHA in their diet

40,000  
peer-reviewed articles on EPA and DHA together

4,000  
peer-reviewed articles on EPA

650  
peer-reviewed articles on DHA

OMEGA-3 EXPERTS  
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Why use the  
Clinical Study  
Database?

ILLUMINATE THE SCIENCE  
GOED CLINICAL STUDY DATABASE

GOED Clinical Study Database

OMEGA-3 EXPERTS  
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## Heart Health and Aging



- Cardiovascular disease is the leading cause of death worldwide
- Consumption and supplementation of EPA and DHA is an effective lifestyle strategy for CVD prevention
  - The protective effect probably increases with dosage





Barnesconi, A. A., West, M. M., Lewis, C. J., Miani, R. V., & Laakonen, J. A. (2021). Effect of Omega-3 Dosage on Cardiovascular Outcomes: An Updated Meta-Analysis and Meta-Regression of Interventional Trials. *Mayo Clinic proceedings*, 96(2), 304-313. <https://doi.org/10.1053/j.mcp.2020.09.024>

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## Brain / Cognitive Health and Aging

- Important and pervasive public health concern
- Essential for the structure and function of a healthy brain (beginning in utero)
- Hundreds of health outcomes and assessment options
  - Results are between neutral and positive





Zhang, X. W., Hsu, W. S., Li, M., & Tang, Z. Y. (2018). Omega-3 fatty acids and risk of cognitive decline in the elderly: a meta-analysis of randomized controlled trials, aging clinical and experimental research, 31(1), 167-180. <https://doi.org/10.1007/s11434-017-0954-4>

Zhang, X., Han, H., Gu, X., Liu, L., Wang, T., & Yu, H. (2020). Effect of n-3 long-chain polyunsaturated fatty acids on mild cognitive impairment: a meta-analysis of randomized clinical trials. *European journal of clinical nutrition*, 74(4), 448-454. <https://doi.org/10.1038/s41430-020-0544-4>

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## Vision / Eye Health and Aging



- Structural component to retina and nerves
- In clinical practice, omega-3 supplements are important for combatting dry eye disease
- Increasing intake was associated with a reduced risk of early subtype of age-related macular degeneration





Chi, S. C., Tsai, H. I., & Kang, Y. N. (2019). Effects of Polyunsaturated Fatty Acids on Non-specific Typical Dry Eye Disease: A Systematic Review and Meta-Analysis of Randomized Clinical Trials. *Nutrients*, 11(5), 942. <https://doi.org/10.3390/11050942>

Zhong, Y., Wang, K., Jiang, L., Wang, J., Zhang, X., Xu, J., & Yao, K. (2021). Dietary fatty acid intake, plasma fatty acid levels, and the risk of age-related macular degeneration (AMD): a dose-response meta-analysis of prospective cohort studies. *European journal of nutrition*, 60(4), 803-817. <https://doi.org/10.1007/s00394-020-0546-4>

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## EPA and DHA Omega-3s Throughout the Lifespan

**1. EPA and DHA are essential for fetal development.** Omega-3s are critical for the development of the brain and eyes in the fetus. Low levels of omega-3s during pregnancy are associated with a higher risk of preterm birth and low birth weight.

**2. EPA and DHA are essential for brain development.** Omega-3s are critical for the development of the brain and eyes in the child. Low levels of omega-3s during childhood are associated with a higher risk of attention deficit hyperactivity disorder (ADHD) and depression.

**3. EPA and DHA are essential for heart health.** Omega-3s are critical for the health of the heart and blood vessels. Low levels of omega-3s are associated with a higher risk of heart disease, stroke, and high blood pressure.

**4. EPA and DHA are essential for cognitive function.** Omega-3s are critical for the health of the brain and cognitive function. Low levels of omega-3s are associated with a higher risk of cognitive decline and dementia.

**5. EPA and DHA are essential for eye health.** Omega-3s are critical for the health of the eyes. Low levels of omega-3s are associated with a higher risk of age-related macular degeneration (AMD) and dry eye disease.

**6. EPA and DHA are essential for skin health.** Omega-3s are critical for the health of the skin. Low levels of omega-3s are associated with a higher risk of dry skin, eczema, and psoriasis.

**7. EPA and DHA are essential for joint health.** Omega-3s are critical for the health of the joints. Low levels of omega-3s are associated with a higher risk of osteoarthritis and rheumatoid arthritis.

**8. EPA and DHA are essential for overall health.** Omega-3s are critical for overall health and well-being. Low levels of omega-3s are associated with a higher risk of chronic disease and mortality.

**GOED OMEGA-3**

<https://alwaysoomega3s.com/moreinfo.php#in-lifetime-reasons-why-you-need-omega-3s>

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## Find out more

**Are you getting enough omega-3s?**

**Find out more**

**GOED OMEGA-3**

<https://alwaysoomega3s.com/how-much>

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## Acknowledgements

Thank you to Naturally Informed – powered by the Trust Transparency Center and WholeFoods Magazine for the opportunity to speak about EPA and DHA omega-3s.

Thank you to my colleagues at GOED!

**GOED OMEGA-3**

— THE GOAL ORGANIZATION FOR EPA AND DHA OMEGA-3 —

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