Name: Jordan Musselle-Sexton Activation Code: 38-13-8207144 Sample Date: 1st Feb 2024





OMEGA-3 TEST



HELLO, JORDAN,

Congratulations on taking this important step to improving your health!

Information is power after all. Understanding your current nutritional status allows you to direct your focus to achieve optimal results and a better health outcome.

RESULTS AT-A-GLANCE

Let's look at your overall omega-3 Index score:

Poor

Insufficient

Optimal







Your EPA Result: 4.9 %

Your DHA Result: 5.1 %

The omega-3 index is a test that measures and averages the amount of EPA and DHA compared to the other fatty acids, including saturated fatty acids, in your red blood cells. EPA and DHA are two of the omega-3 fatty acids which provide essential and unique benefits such as reducing inflammation, and risk of chronic diseases.

YOUR RECOMMENDATIONS

Your omega-3 index score is **optimal**. Keep up the good work! We recommend retesting after 12 months to check you are still on track as if your levels do change, this isn't something you're likely to notice right away. To maintain your omega-3 levels:-

- Make sure you don't over supplement now your levels are optimal. Take a supplement maintenance dose of between 500-1,000 mg of EPA & DHA unless advised by a health professional.
- Maintain dietary intake of omega-3 (i.e. mackerel, salmon, sardines, seabass, flaxseeds, linseeds, chia seeds, kale, kidney beans).
- Reduce saturated and trans fatty acids where possible to add other health benefits (i.e. processed foods,
- chocolate, toffee, cakes, puddings, biscuits, pastries, margarine, oils and fried foods).
- Maintain your omega-6 intake
- Ensure you are getting plenty of antioxidants in through diet and supplementation.

This diagram is representative of how your diet can improve through making the recommended changes, with EPA and DHA being the biggest impact.



ADDITIONAL RESULTS OMEGA 6 : 3 RATIO



This test is used to measure the amount of pro-inflammatory omega-6 fatty acids vs the anti-inflammatory omega-3 fatty acids. Although they can promote inflammation, omega-6 fatty acids are still important, therefore maintaining a healthy amount of each is necessary.

AA : EPA Ratio



This is a comparison between your levels of arachidonic acid (AA), an omega-6 fatty acid, and eicosapentaenoic (EPA), an omega-3 fatty acid. These two fatty acids play a key role in the body's metabolic processes, including inflammation. Whilst both are essential fatty acids, having too high an AA:EPA ratio can increase inflammation and potentially affect your overall health.

Trans Fat Index



The trans fats index measures the artificial fats which have undergone a process called hydrogenation, altering their chemical structure. They are known to have numerous negative health impacts, including poor heart health and increased cancer risk. They are normally found in heavily industrialised foods also known as ultra processed foods. Whilst there are no specified optimal ranges for the trans fats index, the lower the amount the better. Whilst there are no specified optimal ranges for the trans fats index, the lower the amount the better. The index is shown for informational purposes and for monitoring progress.

ADDITIONAL RESULTS

Fatty Acid Profile

Туре			Fatty Acid	Whole Blood (%)
			Myristic Acid	1.1 %
		Palmitic Acid	25.9 %	
Saturated Fatty Acids			Stearic Acid	13.4 %
			Arachidic Acid	0.2 %
		Behenic Acid	0.4 %	
			Lignoceric Acid	0.7 %
Unsaturated Fatty Acids	Polyunsaturated Fats (PUFAs)	Omega-3	Alpha-linolenic acid (ALA)	0.3 %
			Eicosapentaenoic acid (EPA)	3.6 %
			Docosahexaenoic acid (DHA)	3.8 %
			Docosapentaenoic acid (DPA)	1.7 %
			Linoleic acid (LA)	18 %
			Gamma-linolenic acid (GLA)	0.3 %
		Omega-6	Eicosadienoic Acid	0.3 %
			Dihomo-gamma-linolenic acid (DGLA)	1.3 %
			Arachidonic acid (AA)	9.3 %
			Docosatetraenoic acid	0.5 %
			Docosapentaenoic acid n-6	0.2 %
	Monounsaturated fats (MUFAs)	Omega-7	Palmitoleic Acid	1.1 %
		Omega-9	Oleic Acid	16.2 %
			Eicosenoic Acid	0.3 %
			Nervonic Acid	0.6 %
			Trans Palmitoleic Acid	0.5 %
Trans-fatty acids			Elaidic Acid (trans-oleic acid)	0.2 %
			Trans Linoleic Acid	0 %

This is your fatty acid profile, it is from these values that your omega index and ratios are calculated. Although there are no defined references ranges for the individual fatty acids for general populations, the raw results have been included for information, as well as for your health professional, who may be able to extract further insights specifically for you.

OTHER FACTORS BMI



Age



As you age, your gut naturally declines putting you at greater risk of nutritional low levels.

Current Supplements

1. Fish oil with ~1000 mg EPA/DHA

Your Known Medical Conditions

1. Gilberts' Syndrome

Many diseases can affect nutrient absorption. Please contact your doctor or health professional for advice.

Mental Health

Mental health issues like anxiety can cause oxidative stress which can damage and lower omega-3 fatty acids in addition to reducing antioxidants that protect them. Lower levels of omega-3 may also result in the production of stress hormones, leading to levels lowering further. Eating a rainbow of antioxidant-rich fruit, vegetables, herbs, and spices can also protect against oxidative stress.

Exercise

Taking part in exercise is great for improving strength and cardio health. However, it can cause oxidative stress in your muscles that can lead to cell damage as well as lowering omega-3 and antioxidant levels. To combat this, have omega-3 and antioxidant -rich food, and/or supplements, where needed.

Other Factors

1. Male

2. Oily Fish intake: Once or twice per week

Smoking

Smoking is a significant contributor to oxidative stress, and it is therefore vital to include antioxidant-rich food and sources of omega-3 in your diet daily.

Alcohol

Chronic alcohol consumption can negatively impact how we absorb and utilise fat. Alcohol may also deplete levels of antioxidants, which can result is also a source of oxidative stress, reducing the amount of omega-3 we absorb and lowering our levels. However, drinking in moderation as part of a healthy diet and lifestyle can limit the effect it will have on your omega-3 levels.



RECOMMENDED DOSAGES

<u>Who</u>	Dosage Guidelines		
General note	The most effective way to consume omega-3 is by supplementing with EPA/DHA or eating oily fish. As a guide if you eat one portion of oily fish (trout, salmon, sardines, mackerel) per week, this is equivalent to approximately 250 mg of EPA/DHA per day.		
Min	250-500 mg of EPA/DHA per day. ⁽²⁰¹⁸⁾		
Max	5,000 mg of EPA/DHA per day. ⁽²⁰¹⁸⁾		
lf your omega-3 index score is poor i.e. ≤4%	At least 2,000 mg of EPA/DHA daily for three months and retest. ⁽²⁰³⁵⁾		
If your omega-3 index score is insufficient i.e. between 4.1-7.9%	At least 1,000 mg of EPA/DHA daily for three months and retest. ⁽²⁰³⁵⁾		
Maintenance dose if your omega-3 index score is optimal i.e. ≥8%	500-1,000 mg of EPA/DHA daily.		
Pregnant, looking to get pregnant soon or breastfeeding			

Age, BMI, sex, smoking, alcohol intake, dietary requirements, medical conditions and medications may affect your levels and how much is required to maintain optimum levels. Please contact your nutritionist for further advice.