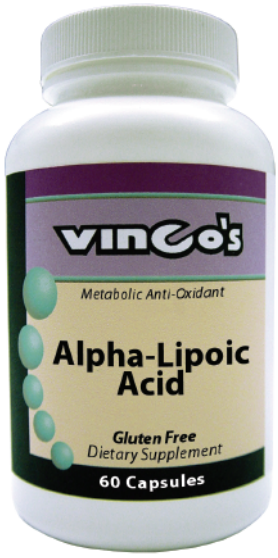
Alpha-Lipoic Acid

PROFESSIONAL FORMULATION



Item # V-ALA
60 capsules per bottle
Dietary Supplement

gluten free

- A powerful metabolic antioxidant
- Energy producer
- Heavy metal eliminator
- Recycles other antioxidants
- Regulates blood glucose

Overview

Alpha-lipoic acid is one of the most powerful antioxidants ever discovered. It is a vitamin-like sulfur-containing compound that is synthesized naturally in the human body. Sometimes it is referred to as alpha-lipoate, thioctic acid, or just lipoic acid. One of its most important characteristics is that it is both fat-soluble and water-soluble. This enables it to provide antioxidant protection in a much wider range of physiological environments throughout the body, which has resulted in some scientists referring to alpha-lipoic acid as the "universal" antioxidant. In the body, alpha-lipoic acid is converted to dihydrolipoic acid (DHLA), which also functions as a strong antioxidant. Lipoic acid is part of two enzyme systems: PDH (pyruvate dehydrogenase) and alpha-ketoglutarate dehydrogenase. These enzymes are part of the Krebs cycle and are essential in the production of energy.

Functions in the Body

Energy Production - Functions as a co-enzyme cofactor in the pyruvate dehydrogenase and alpha-ketoglutarate dehydrogenase mitochondrial enzyme complexes in the production of energy.[1]

Heavy Metal Detoxification - Lipoic acid reduces the toxicity from toxic metals such as mercury,[2] cadmium,[3] and lead.[4] It is also able to form stable complexes with copper, manganese, and zinc ions.[5]

Recycling of other Antioxidants - Able to recycle antioxidants such as vitamin C, vitamin E, glutathione, and coenzyme Q10.[6,7,8,9]

Regulation of Blood Glucose - Increases glucose uptake into muscle cells.[10]

Universal Antioxidant - Because it is able to function in both fat- and water-soluble environments throughout the human body, lipoic acid has been called the "universal" antioxidant.[11,12]

Clinical Applications

Aids - Alpha-lipoic acid blocks the activation of a substance called NF-kappa B, which is necessary for the transcription of the HIV virus. Thus, alpha-lipoic acid may play an important therapeutic role in HIV-infected individuals.[13] In a study with HIV-infected patients, supplementation with alpha-lipoic acid provided a variety of benefits related to antioxidant status, T-helper lymphocytes, and the T-helper/suppressor cell ration.[14]

Alzheimer's Disease - The authors of a small study in Germany reported that lipoic acid may be a successful 'neuroprotective' agent in the treatment of Alzheimer's disease and related dementias. Nine patients were administered 600 mg/day of alpha-lipoic acid in conjunction with their standard treatment with acetylcholinesterase inhibitor drugs over a period ranging from approximately 8.5 to 14 months. This treatment lead to a stabilization of cognitive function as evidenced by constant scores in two standard neuropsychological tests commonly used to assess AD patients.[15]

Amanita mushroom poisoning - Lipoic acid has been used successfully alone and in combination with other agents in patients with amanita mushroom poisoning.[16,17,18]

Cardiovascular Disease - Oxidative stress plays a major role in the aging of the cardiovascular system. The administered lipoic acid to aged rats significantly reduced the level of oxidant production in cardia myocytes, down to the level found in young non-supplemented rats. Lipoic acid also restored myocardial vitamin C levels and reduced oxidative damage to DNA. This animal study suggests that the aging of the heart in the elderly is at least in part due to oxidative stress in mitochondria of cardiac myocytes, and that lipoic acid may provide significant protection against this process.[19] Cataract studies

have shown that alpha-lipoic acid's antioxidant activity and its ability to regenerate glutathione help to prevent the type of damage in eyes that leads to the development of cataracts.[20]

Diabetes - Alpha-lipoic acid increases glucose uptake into muscle cells and increases insulin sensitivity in individuals with Type 2 diabetes.[21,22] Also, alpha-lipoic acid's antioxidant activity helps protect against many of the health risks associated with diabetes.[23]

Diabetic Neuropathy - In experimental diabetic neuropathy, alpha-lipoic acid provides increased nerve blood flow, reduces oxidative stress, and improves distal nerve conduction.[24] In humans, it has been demonstrated that oral administration of 600 mg/day of lipoic acid can prevent or improve diabetic neuropathy, which may be due to a lowering of lipid peroxidation.[25]

Glaucoma - Over 50 percent of patients with stage II open angle glaucoma exhibited significant improvement when given 150 mg of alpha-lipoic acid for a period of 2 months.[26]

Hepatitis C - It has been reported that alpha-lipoic acid, in combination with selenium and silymarin, is an effective and far less expensive treatment for hepatitis C, compared to conventional therapy. Three closely monitored cases involved cirrhosis, portal hypertension and esophageal varicies secondary to hepatitis C. Each patient received the antioxidant combinatino and had their hepatitis C complication resolved. The patients returned to work, resumed their normal daily activities and reported feeling healthy, avoiding liver transplantation. Whereas liver transplantation is estimated to cost more than $300,000 a year, the annual cost of this triple antioxidant therapy is approximately $2,000.[27]

Peripheral Neuropathy - Diabetic individuals treated with alpha-lipoic acid experienced significant improvement in nerve conduction and nerve blood flow.[28]

Precautions

Because of its ability to lower elevated blood sugar levels, it should be used with caution in people with diabetes or hypoglycemia.[29,30] There are no known toxicities associated with alpha-lipoic acid. Occasional skin rashes have been reported.

Directions for Use:

As a dietary supplement for adults and children 12 or more years of age,
take one or two capsule daily, or as directed by a qualifiedhealthcare professional.

Ingredients:

Alpha-Lipoic Acid 300 mg.

VINCO INC.
1-800-245-1939
www.vincoinc.com

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