



A REVIEW ON BIOLOGICAL ROLES OF ANTIOXIDANTS

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ABSTRACT:

A big price has paid in terms of poisonous derivative when life forms on planet switched from using energy which is without oxygen to energy with oxygen which are known as free revolutionaries. All on these beget severe cellular and DNA spoilage contributing to deterioration of bone. Nasty towel conformation Enzyme conking Atherosclerosis. Antioxidants are the resistance to this free revolutionaries. It's honored that antioxidant have the capability to serve as kind protection.

Introduction:

FREE Revolutionaries

Free revolutionaries are formed when oxygen is metabolized in the human body and are non organic species that retain an unmatched negatron in the external patch. That's why free revolutionaries largely reply with gluten, cellulose. These free revolutionaries attack the nearest solid patch, taking its negatron.

1) ANTIOXIDANT

To fight the dangerous goods of free revolutionaries like oxygen radicals and nitrogen radicals, antioxidant resistance medium operates to filter these O_2 radicals and N_2 radicals. Antioxidants, together with the substances that are able of either reducing oxygen radicals or precluding their conformation, form an impeding buffer and have impact on the capability of the oxygen metabolites. All reducers, thereby form defensive mechanisms, which maintain the smallest possible Some of the response in the the body that produce free revolutionary involve essence ions. Some antioxidants similar as tannins in walnut, brew and heterocyclic compounds, essence ions.

Antioxidant Food

The following is a list of the most well-known antioxidants, and the foods in which they're found.

- Minerals
- Zinc
- Oysters, pork, eggs, beans
- Beef, lean
- Chicken heart
- Egg yolk
- Fish
- Herring
- Lamb
- Maple syrup
- Milk
- Molasses, black-strap
- Oysters
- Pork
- Sesame seeds
- Soybeans
- Sunflower seeds
- Turkey

- Wheat bran
- Wheat germ
- Whole-grain products
- Yeast
- Manganese

Avocados, Barley, Beans, Blackberries, Bran, Buckwheat, Chestnuts, Cloves, Coffee, Ginger, Hazelnuts (filberts), Oatmeal, Peanuts, Peas, Pecans, Seaweed, Spinach

OXIDATIVE STRESS

In most of which are aldehydes, like malondialdehyde (MDA), 4-hydroxynonenal (HNE), etc. Oxidative stress causes serious cell damage leading to a variety of human diseases like Alzheimer's diseases, Parkinson's diseases, atherosclerosis, cancer, liver damage, rheumatoid arthritis, immunological incompetence, neurodegenerative disorders, etc.

ANTIOXIDANT & TOXIC CHEMICALS ~

The consumption of alcoholic beverages is known to cause acute and/or chronic toxicity to a number of tissues including those of the nervous system, liver, gastrointestinal tract and cardiovascular system. Ethanol is responsible for mitochondrial damage, hepatic lipid accumulation and oxidative damage to macromolecules. It has been demonstrated that this damage can be blocked to some extent by the use of nutritional antioxidants. Vitamin C has been shown to protect against drugs such as chemotherapeutic agents, digitalis, benzene, barbiturates, aspirin and a number of biological toxins including botulinum toxin, tetanus toxin.

ANTIOXIDANTS AND ALZHEIMER'S

Some researchers hypothesize that free radicals upset the delicate membrane machinery that regulates what goes into and out of the cell such as calcium. The body has certain lines of defence against oxygen free radicals. Enzymes like superoxide dismutase (SOD) and catalase can disarm the damaging oxygen molecule. Acetyl-L-carnitine may also show Alzheimer's by reducing.

CONCLUSION:

The imbalance between ROSs and antioxidant defence systems may increase the oxidative burden and lead to the damage of macromolecules. Antioxidants, which can scavenge the free radical, have an important role in biological system and their use is implicated in the prevention of cancer, heart diseases, ageing, etc. Human mechanism has an inherent mechanism to reduce the free radical induced injury by enzymatic or non-enzymatic methods. Since herbs are known to exert antioxidant activity and are considered to have less or no toxic effects, they would be the best alternative method when the normal level of antioxidant defence mechanism fails.

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