

# (Multivitamins, Multimineral Gummies)

# **Composition:**

| Copper Sulphate     | 40 mcg   |
|---------------------|----------|
| Chromium Picolinate | 20 mcg   |
| Inositol            | .500 mcg |
| Boron               | . 10 mcg |
| Molybdenum          | .2.5 mcg |
| Exicipents          | .q.s.    |

## **Clinical Pharmacology**

#### Vitamin A

Vitamin A, carotenoids and palmitates are effective antioxidants for inhibiting the development of heart disease. Vitamin A is crucial for maintaining vision, promoting growth and development, and protecting epithelium and mucus integrity in the body. Vitamin A is known as an anti-inflammation vitamin because of its critical role in enhancing immune function.

## Vitamin B complex

Vitamin B complex are one of the most essential group of vitamins and vital in maintaining the health of the nervous system, skin, eyes, hair, liver, brain function, muscle tone and gastrointestinal tract. These vitamins together are responsible for helping enzymes release from food, promote proper metabolism, give cells plenty of oxygen, detoxify organs, stabilize your nervous system functions, keep skin and hair healthy, prevent defective vision and have also been used in the treatment of debilitating conditions.

### Vitamin C

Vitamin C contributes to immune defense by supporting various cellular functions of both the innate and adaptive immune system. Vitamin C supports epithelial barrier function against pathogens and promotes the oxidant scavenging activity of the skin, thereby potentially protecting against environmental oxidative stress. Vitamin C accumulates in phagocytic cells, such as neutrophils, and can enhance chemotaxis, phagocytosis, generation of reactive oxygen species, and ultimately microbial killing. It is also needed for apoptosis and clearance of the

spent neutrophils from sites of infection by macrophages, thereby decreasing necrosis/NETosis and potential tissue damage. The role of vitamin C in lymphocytes is less clear, but it has been shown to enhance differentiation and proliferation of B- and T-cells, likely due to its gene regulating effects.

#### Minerals

Minerals are chemical constituents used by the body in many ways. Although they yield no energy, they have important roles to play in many activities in the body. Magnesium, copper, selenium, zinc, iron, manganese and molybdenum are important co-factors found in the structure of certain enzymes and are indispensable in numerous biochemical pathways. Sodium, potassium and chlorine are important in the maintenance of osmotic balance between cells and the interstitial fluid.

#### Zinc

Zinc is an essential element for various physiological activities in the body such as cell growth, cell differentiation and development. It shows catalytic activity for various enzymes in both plants and animals. Zinc plays important role in boosting the immune system by keeping immune system strong. Deficiency of zinc may affects the human health and it causes many diseases such as hypogonadism, cognitive impairment, poor immune system, diarrhea, delayed wound healing, oligospermia, neurosensory disorders, decreased body mass. Zinc deficiency mainly affects T helper cells.

### **Indications**

Multivitamins, Multimineral Gummies are used to provide vitamins and minerals that are not taken in through the diet. Multivitamins are also used to treat vitamin deficiencies (lack of vitamins) caused by illness, for bone growth and bone mass acquisition, poor nutrition, digestive disorders, and many other conditions

### **Precautions and Warnings**

An overdose of vitamins A, B, C, and E can cause serious or life-threatening side effects. Certain

minerals contained in a multivitamin may also cause serious overdose symptoms if you take too

much. Minerals such as calcium, iron, magnesium, potassium, and zinc. Minerals (especially

taken in large doses) can cause side effects such as tooth staining, increased urination, stomach

bleeding, uneven heart rate, confusion, and muscle weakness or limp feeling.

**Drug Interactions** 

Multivitamins interactions can make a drug less effective, increase the action of a drug, or

cause unexpected side effects. There are also reports of certain drugs decreasing the

effectiveness of vitamins and minerals. Reported interactions include vitamin E and aspirin with

the potential for an additive antithrombotic effect and between vitamin E and warfarin related

to an increased risk of bleeding. An antioxidant supplement containing vitamins C and E,

carotene, and selenium used in the treatment arm of a randomized controlled clinical trial

blocked the beneficial response of HDL to simvastatin-niacin therapy in patients with coronary

artery disease and low HDL

**Adverse effects** 

Upset stomach, headache, or unusual or unpleasant taste in your mouth.

Overdosage

Overdose symptoms may include stomach pain, vomiting, diarrhea, constipation, loss of

appetite, hair loss, peeling skin, tingly feeling in or around your mouth, changes in menstrual

periods, weight loss, severe headache, muscle or joint pain, severe back pain, blood in urine,

pale skin, and easy bruising or bleeding

Route of administration: Oral.

**Type of formulation:** Chewable Gummy.

Flavour: Delicious orange flavour

# Dosage:

As Dietary Supplement, for children: 1 gummy a day, for adults: 2 gummies in a day.

# Storage

Store in cool and dry place.

**Presentation:** Smart Gummy available as 15 gummies per bottle.

# Marketed By:



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