

Metabolic Synergy™



Nutritional support for optimal glucose, insulin & leptin levels

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Metabolic Synergy™ is an ideal formula for the metabolic syndrome patient. A nationally prominent medical doctor specializing in blood sugar and endocrine health designed this multivitamin and mineral formula. It includes carnosine and benfotiamine (a form of vitamin B1), two anti-glycating agents that help to prevent/diminish diabetic complications.

Highlights

- **600 mg lipoic acid + 4 mg biotin per recommended dosage** - prevents the typical reduction in carboxylase enzymes seen in research when lipoic acid is given alone. These two nutrients together aid healthy insulin secretion and glucose metabolism.
- **600 mg taurine, 200mg EGCg from green tea and 400 IU vitamin D** - all of which help insulin to work better
- **50 mg benfotiamine, 200 mg carnosine and 165 mg of vitamin E** - to protect from neuropathy and kidney damage
- **3000 IU vitamin A** - important for immune system
- **75 mg vitamin B1 (as thiamine HCl and benfotiamine)** - needed for energy
- **100 mcg molybdenum** - needed for detoxification
- **400 mcg NatureFolate™** - proprietary blend of active isomer, naturally-occurring folates

Metabolic Synergy™ provides nutrients needed for the TCA (tricarboxylic acid) cycle, also known as the Krebs cycle or citric acid cycle. This cycle allows the body to burn food for energy by converting glucose into ATP. The more glucose burned, the less glucose in the bloodstream.

Nutrients needed for the TCA cycle include magnesium, manganese and lipoic acid. Due to their insulin mimicking action, vanadium and magnesium help glucose get inside cells where this burning occurs. These two nutrients are also helpful for blood pressure issues.

Metabolic syndrome is a condition many people risk developing by the time they reach middle age. Metabolic syndrome is defined as a cluster of symptoms or disorders including insulin and leptin resistance, hyperlipidemia (elevated cholesterol and triglycerides), high blood pressure and overweight (weight gain in the belly region is a tell-tale sign). The factors that may lead to these conditions are:

- Excessive carbohydrate consumption, with especially damaging effects from fructose and galactose
- Excessive stored body fat, especially in the abdominal area, due to its active hormonal activity
- Nutrient deficiencies (inositol, chromium, vanadium, magnesium, zinc, omega-3 fatty acids, vitamin D, taurine, vitamin C, vitamins B1, B2, B3)
- High oxidative stress, which depletes antioxidants
- Prolonged demand on the pancreas to produce insulin
- Excessive stress (high adrenaline and cortisol)

A sustained program of lifestyle and dietary changes combined with proper nutrient supplementation can help to reverse and correct most of the underlying causes of metabolic syndrome.

Supplement Facts

Serving Size 3 capsules
Servings Per Container 60

Amount Per Serving	% Daily Value	Amount Per Serving	% Daily Value
Vitamin A (from Palmitate and Mixed Carotenoids from Palm Tree Fruit)	1500 IU 30%	Selenium (as Selenium Glycinate Complex)	100 mcg 143%
Vitamin C (as Ascorbic Acid)	250 mg 417%	Manganese (TRAACS® Manganese Bisglycinate Chelate)	1 mg 75%
Vitamin D (as Cholecalciferol)	200 IU 50%	Chromium (TRAACS® Chromium Nicotinate Glycinate Chelate)	250 mcg 208%
Vitamin E (as d-alpha Tocopherol)	12 IU 42%	Molybdenum (TRAACS® Molybdenum Glycinate Chelate)	50 mcg 67%
Thiamin (Vitamin B-1) (as Thiamin HCl 12 mg and Benfotiamine 25 mg)	37 mg 2500%	Potassium (as Potassium Glycinate Complex)	100 mg 3%
Riboflavin (Vitamin B-2)	12 mg 735%	Alpha Lipoic Acid	300 mg *
Niacin (Vitamin B-3)(as Niacinamide)	25 mg 125%	Taurine	300 mg *
Vitamin B-6 (as Pyridoxine HCl and Pyridoxal-5-Phosphate)	25 mg 1250%	Inositol	250 mg *
Folate (NatureFolate™ blend)	200 mcg 50%	Green Tea Extract (<i>Camellia sinensis</i>) (leaves) (standardized to contain 98% polyphenols, 45% EGCg)	100 mg *
Vitamin B-12 (as Methylcobalamin)	500 mcg 8333%	Carnosine	100 mg *
Biotin (as d-Biotin)	2000 mcg 667%	High Gamma Mixed Tocopherols (as d-gamma, d-delta, d-alpha, d-beta)	82 mg *
Pantothenic Acid (as d-Calcium Pantothenate)	25 mg 250%	Vanadium (TRAACS® Vanadium Nicotinate Glycinate Chelate)	100 mcg *
Iodine (as Potassium Iodide)	37 mcg 25%		
Magnesium (as Di-Magnesium Malate)	50 mg 13%		
Zinc (TRAACS® Zinc Bisglycinate Chelate)	15 mg 100%		

*Daily Value not established.

Other Ingredients: Cellulose (capsule), vegetable stearate, silicon dioxide.

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Metabolic Synergy™ is protective against many complications associated with out-of-control glucose levels by reducing its ability to glycate various body proteins in the bloodstream, which in turn has damaging effects on the eyes, brain, kidney, etc. This is achieved with the help of lipoic acid, carnosine and benfotiamine, which have been proven to reduce the risk of neuropathy/retinopathy along with support from vitamin B6, B12 and high gamma vitamin E. This formula has multiple antioxidants for controlling the oxidative stress common in a diabetic.

Excessive fructose consumption can lead to excessive glycation of proteins (up to 16 times faster), hypertension, impaired insulin function (via reduced tyrosine phosphorylation). Metabolic Synergy™ reduces the damaging effects of fructose consumption through EGCg, zinc, and taurine.

The benefits of normalizing glucose, insulin, and leptin metabolism include: reduced risk of diabetes-related complications (neuropathy, kidney or vision damage), lower cardiovascular risk (lower blood pressure, triglycerides, increased HDL, better endothelial function), reduced cell proliferation (tumors), less water retention, less fat storage and easier fat release from the adipose cells.

Metabolic Synergy™ may help:

- Support conversion of carbohydrates to energy
- Lower fasting and average glucose levels (hemoglobin A1C)
- Lower fasting and average insulin and leptin levels with improved tissue sensitivity
- Reduce risk of dysglycemia (blood sugar highs and lows)
- Support pancreatic sensitivity & ability to produce adequate amounts of insulin
- Prevent problems associated with out-of-control sugar levels (glycation) such as:
 - ▶ neuropathy
 - ▶ kidney damage
 - ▶ pancreatic damage
 - ▶ retinopathy
 - ▶ blood vessel damage
- Prevent nutrient deficiencies induced by excessively high glucose/insulin levels
- Lower cardiovascular complications associated with diabetes and insulin resistance
- Protect from metabolic damage induced by excessive fructose consumption
- Lower homocysteine

Recommended Use:

- As a dietary supplement, take three capsules twice per day with a meal, or as directed by a health care practitioner.

References

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4. Boucher BJ. Inadequate vitamin D status: does it contribute to the disorders comprising syndrome 'X'? Br J Nutr. 1998 Apr;79(4):315-27.
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