

OptiCleanse™ Plus

Optimal Cleansing Formula* Suitable for Vegans



Available in Vanilla Delight, Creamy Chocolate & Chai

Discussion

OptiCleanse™ Plus represents an advanced, comprehensive approach to supporting the body's detoxification processes. Provision of high-quality, easy-to-digest protein with the addition of amino acids, micronutrients, essential fatty acids, and metabolic cofactors makes OptiCleanse Plus an indispensable adjunct to an effective detoxification program.*

VegaPro™ is XYMOGEN's proprietary blend of pea protein isolate and rice protein concentrate plus L-glutamine, L-glycine, and taurine. Generation of glutathione and sulfation cofactors necessary for phase II conjugation requires an array of amino acids. The combination of pea protein and rice protein provides a non-GMO protein source that is easily digested and achieves an amino acid score of 100% (a measure of how efficiently a protein meets the protein synthesis needs of children and adults). VegaPro does not contain milk, soy, wheat, corn, or animal-based protein.*

OptiCleanse Plus contains 24 grams of protein per serving—the equivalent of approximately three-and-a-half ounces of dietary protein derived from sources such as poultry or fish. Dietary protein is essential for building and maintaining lean body mass, hormones, and neurotransmitters. Protein is also essential for the biosynthesis of metabolically active tripeptides such as glutathione, a key factor in detoxification of exogenous and endogenous toxins. Overall protein-energy metabolism affects phase II detoxification reactions as well as the activity of cytochrome P450 enzymes, the enzymes which detoxify environmental chemicals and drugs.*^[1]

Vitamins and Minerals Adequate biotransformation depends upon the mitochondrial generation of ATP, which requires several nutrient cofactors including thiamin, riboflavin, niacin, pantothenic acid, and magnesium. Minerals such as selenium, copper, zinc, and manganese, along with vitamins A, C, and E support antioxidant mechanisms that counteract the reactive oxygen species (intermediary metabolites) that occur between phase I and phase II detoxification. N-acetyl-cysteine

Clinical Applications

- » Supports Natural Detoxification Mechanisms*
- » Supports Healthy Hormone Metabolism*
- » Provides High-Quality Macro- and Micronutrients*

*OptiCleanse™ Plus provides macro- and micronutrients that support all phases of biotransformation and detoxification; these nutrients also support the mitochondrial energy production necessary to complete this vital function. OptiCleanse Plus is easy to digest and has a low-allergy potential, a pleasant taste, and no added fructose. OptiCleanse Plus features VegaPro™, XYMOGEN's proprietary pea/rice protein blend; Aminogen®, to facilitate protein absorption; activated B vitamins, such as riboflavin 5'-phosphate (B2), pyridoxal 5'-phosphate (B6), 5-methyltetrahydrofolate (folate), and methylcobalamin (B12); and Albion's patented TRAACS® mineral amino acid chelates. 5-methyltetrahydrofolate (5-MTHF) is provided as Quatrefolic®†, a stable, bioavailable form of folate. In conjunction with a modified elimination diet, OptiCleanse Plus not only addresses healthy detoxification, but also supports energy generation. This formula is suitable for vegans.**

and alpha-lipoic acid are present to support production of glutathione, which is also provided intact in OptiCleanse Plus.*

Specific ingredients that support phase II pathways comprise the activated, readily available form of B vitamins, including 5-methyltetrahydrofolate (folate), methylcobalamin (B12), and pyridoxal 5'-phosphate (B6) for methylation; Preventium® (a patented form of potassium hydrogen d-glucarate) for glucuronidation; alpha-lipoic acid (for antioxidant and liver support); N-acetyl-cysteine for sulfation; and d-calcium pantothenate, pyridoxal 5'-phosphate, and magnesium for acetylation.^[2-7] 5-methyltetrahydrofolate (5-MTHF) is provided as Quatrefolic®, which has greater stability, solubility, and bioavailability than calcium salt forms. Using science and patented technology, the formula's pharmaceutical-grade inorganic minerals have been transformed into mineral amino acid chelates for enhanced absorption by the body. XYMOGEN has earned, and OptiCleanse Plus proudly bears, the Albion Gold Seal.*

MeadowPure™ provides organic, full-fat, non-GMO, milled golden flax seeds that have been selected and processed under U.S. patent. Flaxseed is found to be the most abundant source of the lignan SDG (secoisolariciresinol diglucoside). Metabolites of SDG are closely studied for their roles in supporting healthy hormone metabolism, detoxification, antioxidant mechanisms, and maintenance of normal lipid and glucose levels.^[8] MeadowPure is also a source of the essential omega-3 fatty acid alpha-linolenic acid, as well as soluble fiber, vitamins, minerals, and the essential omega-6 fatty acid, linoleic acid.*

Designed for comprehensive detoxification with additional gastrointestinal support, OptiCleanse Plus also provides inulin (from non-GMO chicory), a valuable prebiotic and source of dietary fiber, as well as glutamine,^[9-11] a conditionally essential amino acid.*

*These statements have not been evaluated by the Food and Drug Administration. This product is not intended to diagnose, treat, cure, or prevent any disease.

OptiCleanse™ PLUS Vanilla Delight Supplement Facts

Serving Size: 2 Scoops (about 59 g)
Servings Per Container: About 14

Amount Per Serving	%Daily Value†
Calories 260	
Calories from Fat 100	
Total Fat 11 g	17%
Saturated Fat 3.5 g	18%
Total Carbohydrate 16 g	5%
Dietary Fiber 4 g	16%
Sugars 5 g	**
Protein 24 g	48%
Vitamin A (as natural beta-carotene)	5000 IU 100%
Vitamin C (ascorbic acid)	220 mg 367%
Vitamin E (as d-alpha tocopherol and mixed tocopherols)	110 IU 367%
Thiamin (as thiamine HCl)	5 mg 333%
Riboflavin (as riboflavin 5'-phosphate sodium)	2.2 mg 129%
Niacin (as niacinamide)	10 mg 50%
Vitamin B6 (as pyridoxal 5'-phosphate)	5 mg 250%
Folate (as Quatrefolic® (6S)-5-methyltetrahydrofolic acid, glucosamine salt)	200 mcg 50%
Vitamin B12 (as methylcobalamin)	22 mcg 833%
Biotin	320 mcg 100%
Pantothenic Acid (as d-calcium pantothenate)	6 mg 60%
Calcium (as DimaCal® di-calcium malate and ingredients with naturally occurring calcium)	250 mg 25%
Iron (naturally occurring)	6 mg 33%
Phosphorus (as dipotassium phosphate)	120 mg 12%
Iodine (as potassium iodide)	55 mcg 37%
Magnesium (as Albion® di-magnesium malate)	140 mg 35%
Zinc (as TRAACS® zinc bisglycinate chelate)	12 mg 80%
Selenium (as Albion® selenium glycinate complex)	55 mcg 79%
Manganese (as TRAACS® manganese bisglycinate chelate)	1.8 mg 95%
Chromium (as TRAACS® chromium nicotinate glycinate chelate)	55 mcg 46%
Molybdenum (as TRAACS® molybdenum glycinate chelate)	150 mcg 200%
Sodium (naturally occurring)	430 mg 18%
Potassium (naturally occurring)	930 mg 27%
MeadowPure® Stabilized Flaxseed Complex	9 g **
Alpha-Linolenic Acid	2.07 g **
Linoleic Acid	630 mg **
Preventium® (potassium d-glucarate)	250 mg **
N-Acetyl-L-Cysteine	55 mg **
L-Glutathione	29 mg **

† Percent Daily Values are based on a 2,000 calorie diet.

** Daily Value not established.

Other Ingredients: VegaPro™ (XYMOGEN's proprietary blend of pea protein concentrate, pea protein isolate, taurine, glycine, rice protein concentrate, and L-glutamine), sunflower oil, natural flavors (no MSG), dried cane syrup, medium-chain triglyceride oil, tripotassium citrate, cellulose gum, xanthan gum, Aminogen®, guar gum, stevia leaf extract, and silica.

DIRECTIONS: Blend, shake, or briskly stir two level scoops (59 g) into 10-12 oz chilled water and consume once daily, or as directed by your healthcare practitioner. Adjust amount of water to desired sweetness and thickness.

Consult your healthcare practitioner prior to use. Individuals taking medication should discuss potential interactions with their healthcare practitioner. Do not use if tamper seal is damaged. The labeling on this product does not comply with California's Proposition 65. Therefore, this product may not be sold in California.


DOES NOT CONTAIN: Wheat, gluten, yeast, soy protein, animal or dairy products, fish, shellfish, peanuts, tree nuts, egg, artificial colors, artificial sweeteners, or artificial preservatives.

STORAGE: Keep tightly closed in a cool, dry place out of reach of children.

Preventium® is a registered trademark of Applied Food Sciences, LLC. (US patents 4,845,123, 5,364,644, 5,561,160).

 Albion and TRAACS are registered trademarks of Albion Laboratories, Inc. Malates covered by US patent 6,706,904 and patents pending.



 AMINOGEN® is a registered trademark of Triarco Industries. AMINOGEN® is protected under US patent 5,387,422.

 Quatrefolic® † Quatrefolic® is a registered trademark of Gnosis S.p.A. Produced under US Patent 7,947,662.

References:

1. Wu G, Fang YZ, Yang S, et al. Glutathione metabolism and its implications for health. *J Nutr.* 2004 Mar;134(3):489-92. [PMID: 14988435]
2. Brosnan JT, et al. Methylation demand: a key determinant of homocysteine metabolism. *Acta Biochim Pol.* 2004;51(2):405-13. [PMID: 15218538]
3. Levy G. Sulfate conjugation in drug metabolism: role of inorganic sulfate. *Fed Proc.* 1986 Jul;45(8):2235-40. [PMID: 3459670]
4. Zóttaszek R. The biological role of D-glucaric acid and its derivatives: potential use in medicine [in Polish]. *Postepy Hig Med Dosw (Online).* 2008 Sep 5;62:451-62. [PMID: 18772850]
5. Zamek-Gliszczyński MJ, Hoffmaster KA, Nezasa K, et al. Integration of hepatic drug transporters and phase II metabolizing enzymes: mechanisms of hepatic excretion of sulfate, glucuronide, and glutathione metabolites. *Eur J Pharm Sci.* 2006 Apr;27(5):447-86. [PMID: 16472997]
6. Baker SM, Bennett P, Bland JS, et al. *Textbook of Functional Medicine.* Gig Harbor, WA: The Institute for Functional Medicine; 2010.
7. Shils ME, Shike MS, Ross AC, et al. *Modern Nutrition in Health and Disease.* 10th ed. Baltimore, MD: Williams & Wilkins; 2005.
8. Adolphe JL, Whiting SJ, Juurlink BH, et al. Health effects with consumption of the flax lignan secoisolariciresinol diglucoside. *Br J Nutr.* 2010 Apr;103(7):929-38. [PMID: 20003621]
9. Turczynowski W, Szczepanik AM, Garlicki J, et al. Glutamine--its metabolic role and possibilities for clinical use [in Polish]. *Przegl Lek.* 1998;55(12):659-62. Review. [PMID: 10354717]
10. Wang WW, Qiao SY, Li DF. Amino acids and gut function. *Amino Acids.* 2009 May;37(1):105-10. Review. [PMID: 18670730]
11. Wischmeyer PE. Glutamine: role in critical illness and ongoing clinical trials. *Curr Opin Gastroenterol.* 2008 Mar;24(2):190-7. Review. [PMID: 18301270]

Additional references available upon request

Due to the evolving nature of interactions and contraindications, it is advised that practitioners consult a current database for new information.

Typical Amino Acid Profile Per Serving:

Alanine	1,068 mg
Arginine	2,141 mg
Aspartic Acid	2,882 mg
Cysteine	236 mg
Glutamic Acid	4,207 mg
Glycine	1,520 mg
Histidine	618 mg
Isoleucine	1,146 mg
Leucine	2,089 mg
Lysine	1,805 mg
Methionine	265 mg
Phenylalanine	1,360 mg
Proline	1,084 mg
Serine	1,327 mg
Taurine	500 mg
Threonine	932 mg
Tryptophan	245 mg
Tyrosine	951 mg
Valine	1,246 mg

All XYMOGEN® Formulas Meet or Exceed cGMP Quality Standards.

*These statements have not been evaluated by the Food and Drug Administration. This product is not intended to diagnose, treat, cure, or prevent any disease.