Min-Tran®

Available Sizes:
5616: 180 Tablets
5626: 360 Tablets

SLEEP, STRESS, AND MOOD

- Supports a healthy nervous system*
- Magnesium may play a role in the stress response pathway
- Magnesium supports the actions of neurotransmitters that help regulate mood
- Magnesium is involved in sleep pathways that support brain homeostatic sleep processes*
- Excellent source of iodine
- Good source of magnesium and calcium

V GF NON-DAIRY NON-SOY NON-GRAIN

Warning: This product should only be used under the direct supervision of a qualified health care professional. Please consult your health care professional if you are pregnant, nursing, or taking any antithyroid medicines. Keep out of reach of children.

Supplement Facts

Serving Size: 3 Tablets
Servings per Container: 60 or 120

	Amount per Serving	%Daily Value
Calories	5	
Total Carbohydrate	2 g	1%*
Calcium	180 mg	14%
Iodine	450 mcg	300%
Magnesium	70 mg	17%
Sodium	15 mg	<1%

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

Ingredients: Calcium lactate, magnesium citrate, honey, kelp, organic alfalfa (aerial parts), and calcium stearate.

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Min-Tran Supports a Healthy Nervous System*

Iodine and the Nervous System

Iodine is an essential component of thyroid hormone, which regulates many important biochemical reactions, including protein synthesis and enzymatic activity.[1] Thyroid hormone is also required for the developing central nervous system and supports energy metabolism in brain cells.[1,2]

Calcium and Magnesium.

Calcium and magnesium are essential for a number of metabolic functions, including nerve transmission.[3] When a nerve impulse reaches its target site (a muscle or other nerve cells), a rush of calcium ions enter the nerve, which increases the concentration of calcium ions in the cell and triggers the release of neurotransmitters to carry the impulse across the synapse to the target cells.[4] Magnesium plays a role in nerve conduction, muscle contraction, and calcium ion channels through its involvement in the active transport of calcium across cell membranes, which is important for nerve impulse conduction and muscle contraction.[5,6]

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

Standard Process products labeled as **Vegetarian** are considered lacto-ovo vegetarian, which means they are devoid of animal-based tissue, animal-based gelatin, or fish oil. They may contain animal-based ingredients such as dairy, eggs, honey, beeswax, or lanolin. Standard Process products labeled as **Gluten-Free** have been tested to verify they meet the regulations associated with the United States Food and Drug Administration's gluten-free labeling. Standard Process products labeled as **Non-Dairy or Non-Dairy Formula** have been formulated to not contain milk or milk-derived ingredients. Standard Process products labeled as **Non-Soy or Non-Soy Formula** have been formulated to not contain soy or soy-derived ingredients. Standard Process products labeled as **Non-Grain or Non-Grain Formula** have been formulated to not contain any true cereal grain or grain-derived ingredients such as those from wheat, rice, oats, cornmeal, barley, or another cereal grain.

Standard Process
WHOLE FOOD NUTRIENT SOLUTIONS

Min-Tran®

SLEEP, STRESS, AND MOOD

Magnesium in the Body

Sleep Processes

Magnesium is an N-methyl-d-aspartate (NMDA) receptor blocker which may help to support the actions of neurotransmitters that help regulate mood.[7-9] In this way, magnesium is also involved in sleep pathways to help support healthy sleep homeostasis.[10-13] Magnesium is an agonist to the γ-amino butyric acid (GABA) receptor, and activation of the GABA receptor has been shown to be involved with support healthy sleep processes and healthy mood pathways.[14-16]

Stress Response Pathway

A stressor (either physical or psychological) activates the hypothalamic-pituitary- adrenal (HPA) axis and the autonomic nervous system leading to the release of catecholamines, which may be regulated by magnesium.[17,18]

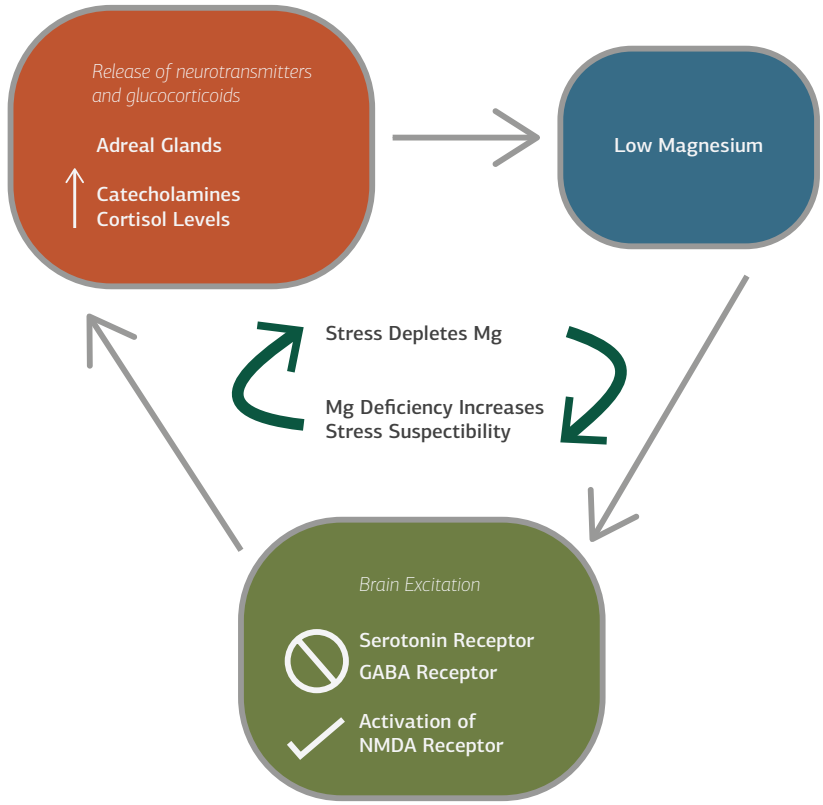

Figure 1. Magnesium and regulation of physiological stress response[19]

The **great majority** of the raw plant ingredients used in our products are grown on our certified organic farm

Freshly picked crops are often processed within a day to maintain vital nutrients

We harvest more than **6.5 million** pounds of ingredients on our certified organic and sustainable farm

Healthy Soil. Healthy Plants. Healthy Lives.

Standard Process is a family-owned company dedicated to making high-quality and nutrient-dense supplements for three generations.

We apply a holistic approach to how we farm, manufacture and protect the quality of our products. This comprehensive strategy ensures that our clinical solutions deliver complex nutrients as nature intended. It's how we define the whole food health advantage.

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REFERENCES

1. Supplements, N.1.o.H.O.o.D. Iodine (Fact Sheet for Health Professionals). (2021).
2. Rao, T.S.S., et al. (2008). Indian J Psychiatry, 50:77.
3. Cuciureanu, M.D., Vink, R. in Magnesium in the Central Nervous System (eds. Vink, R. & Nechifor, M.) (University of Adelaide Press© 2011 The Authors., Adelaide (AU), 2011).
4. Institute of Medicine (US) Committee to Review Dietary Reference Intakes for Vitamin D and Calcium; Ross AC, T.C .. Yaktine AL, et al editors. Dietary Reference Intakes for Calcium and Vitamin D. Washington (DC): National Academies Press (US) (2011).
5. Carvil, P., Cronin, J. (2010). Strength Cond J, 32:48.
6. Elin, R.J. (2010). Magnes Res, 23:S194.
7. Kollinska, J., Liljequist, S. (1998). L-701,324. Psychopharmacology (Berl). 135:175.
8. Plaznik, A., et al. (1994). Eur Neuropsychopharmacol, 4:503.
9. Poleszak, E., et al. Pharmacol Biochem Behav, 78:7.
10. Blanke ML, V.A. Chapter 13: Activation Mechanisms of the NMDA Receptor, (CRC Press/ Taylor & Francis, Boca Raton (FL), 2009).
11. Campbell, 1.G .. Feinberg, I. (1996). J Neurophysiol, 76:3714.
12. Campbell, I.G., Feinberg, I. (7999). Sleep, 22:423.
13. Held, K., et al. (2002). Pharmacopsychiatry, 35:135.
14. Schwartz, R.D., et al. (1994). J Neurochem, 62:916.
15. Poleszak, E. (2008). Pharmacol Rep, 60(4):483,
16. Faulhaber, J., Steiger, A .. Lancel, M. (7997). Psychopharmacology (Berl), 130:285.
17. Amyard, N., et al. (1995). Magnes Res, 8:5.
18. Pinto, J.E. (7979). Horm Metab Res, 11 :404.
19. Pickering, G., et al. (2020) Nutrients, 12(12):3672.

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