



Advanced Nanosphere Technology™

Melatonin Liposome



Julia T. Hunter M.D.
Wholistic Dermatology™
Treating the body as a whole

Physica Energetics

Support for Balancing Circadian Rhythms

Indications:

- Promotes Sleep
- Jet Lag
- Regulates Circadian Rhythms
- Powerful Antioxidant
- Helps to Protect Nuclear and Mitochondrial DNA

Melatonin is produced by the pineal gland during sleep and wanes in the morning, as bright light decreases its production. Its main role in the brain is to regulate sleep/wake cycles and circadian rhythms.

Melatonin levels are highest in children and decrease sharply around 45 years of age. This hormone affects the hypothalamus, pituitary and thyroid gland, thus affecting the release of growth hormones, stress hormones and sex hormones, as well as playing a role in the regulation of blood sugar and calcium levels. Anti-aging specialists believe that melatonin is essential for helping to slow down the aging process.

A stable free radical scavenger, melatonin is one of the most active and effective antioxidants in the body. It is capable of penetrating every cell in the body, thus protecting DNA from free radical damage.

Melatonin stimulates the thymus gland, increasing the levels of circulating T lymphocytes. Research has found that supplemental melatonin can stop or retard the growth of breast, prostate, endometrial and colon cancers and may be useful in the prevention and treatment of AIDS, Alzheimer's disease, Parkinson's disease, Down's Syndrome, asthma and cataracts.

Insomnia, frequent waking, or inability to get back to sleep are all signs of melatonin deficiency. Melatonin's role in the regulation of sleep/wake cycles allow it to be used to induce sleep naturally without suppressing REM sleep, or incurring the side effects commonly associated with sedatives or sleep aids.

Long distance travel can disrupt natural circadian rhythms, leading to symptoms commonly associated with jet lag: headaches, dizziness, insomnia, fatigue, etc. Disruption of natural circadian rhythms can also cause blood sugar imbalances, changes in blood pressure, mood disturbances and hormonal imbalance. Taking supplemental melatonin in the evening of the new time zone, can help reset the body's natural clock and acclimatize the body to the new time zone. This can also be valuable for those performing shift work.

Physica Energetics' Melatonin Liposome Spray - The liposome delivery system ensures immediate

assimilation into the blood supply, bypassing the acidic environment of the stomach. Vitamin B6 supports the production of serotonin, the precursor to melatonin. A cobalt blue bottle protects the remedy from light.

Liposomes are closed, spherical lipid vesicles, composed of a phospholipid bilayer membrane with an aqueous core. The presence of both hydrophobic and hydrophilic components enables them to carry both fat-soluble and water-soluble materials.

Orally administered liposome preparations are absorbed directly into the bloodstream via the sub-lingual mucosa, or Peyer's Patches in the small intestine. Once inside the body, they are able to fuse with the plasma membrane, delivering their contents directly to the inside of the cell. Liposome delivery systems are fast, effective and easily assimilated into the body.

Melatonin Liposome Spray is recommended to assist in regulating normal sleep/wake cycles which may be disrupted during long distance travel, shift work, prolonged stress, or hormonal imbalance. Best taken at 4pm and then just before bed. (Melatonin peaks at approximately 3 a.m.)

Directions:

3-5 sprays 30 minutes before bed-time

Please consult with your Physician at all times before taking any supplementation.

Ingredients (per 0.8 mL)

Melatonin 1.5 mg
Vitamin B6 (Pyridoxine HCl) 1.5 mg

Melatonin Liposome Spray



Julia T. Hunter M.D.
Wholistic Dermatology™
Treating the body as a whole

Synergistically Formulated Ingredients

Melatonin - A hormone produced by the pineal gland, melatonin helps regulate sleep/wake cycles and circadian rhythms. A powerful antioxidant, melatonin protects mitochondrial and nuclear DNA from free radical damage. Research has shown that supplemental melatonin can help slow the aging process, support hormonal balance and protect against certain forms of cancer.

Vitamin B6 - One of the most widely utilized and essential vitamins in the body, vitamin B6 acts as a coenzyme in dozens of enzymatic reactions in the body. Vitamin B6 is required for the growth and maintenance of almost all tissues of the body and for the production of serotonin, the precursor of the hormone melatonin.

References:

Holford, Patrick. 2004. *Optimum Nutrition for the Mind*. North Bergen, NJ: Basic Health Publications Inc.

Klatz, Ronald and Robert Goldman. 2003. *The New Anti-Aging Revolution: Stopping the Clock for a Younger, Sexier, Happier YOU!* North Bergen, New Jersey: Basic Health Publications Inc.

Lieberman, Shari PhD CND FACN and Nancy Bruning. 2003. *The Real Vitamin and Mineral Book*. New York, New York: Penguin Group Inc.